CONSTRUCTION NEWS

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RAILWAYS.

*(*Denotes that this work is advertised in Engineering News.)*

Vermont.—Boston & Maine R. R.—Press reports state that the double tracking of the line from Ashburton, Mass., to Bellows Falls, Vt., is contemplated. A. B. Corthell, Boston, Mass., is Ch. Engr.

Rhode Island.—Southern New England R. R.—Work will soon be begun on the Southern New England between Providence and Woonsocket. About 15 miles will also be constructed in Massachusetts.

New York.—Halite & Northern R. R. Co.—A certificate of convenience and necessity has been granted by the Public Service Commission to the company to build a 35-mile road from Halite on the Pennsylvania R. R. to connect with the Genesee & Wyoming R. R. near Retsolf station. W. A. Hazard, E. W. Brown and A. Biglow, New York, N. Y., are incorporators.

Pennsylvania.—Cumberland Valley R. R.—This company, at an early date, will ask for bids on between 400,000 and 500,000 cu. yds. of grading in connection with its proposed revision of line through Chambersburg. G. C. Koons, Chambersburg, Pa., is Engr.

North Carolina.—Randolph & Cumberland R. R.—Press reports state that it has been decided to extend this line from McConnell to Winston-Salem. D. A. McDonald, Carthage, N. C., is Pres.

Florida.—Ocala Northern R. R. Co.—Announcement has been made that this road will be extended into Jacksonville following the completion of the line to Palatka. E. P. Rentz, Ocala, Fla., is Pres.

Tennessee.—New Orleans, Mobile & Chicago R. R.—This company has a party in the field making a location from Middletown to Jackson, Tenn. The location has now been completed and it is understood that contracts for the work will be let at an early date. L. W. Duffee, New Albany, Miss., is Res. Engr. Noted May 25.

Ohio.—Erie R. R.—Contracts will be let in about a week for about 50 miles of second track between Marion and Lima. W. T. Harahan, 50 Church St., New York, N. Y., is Vice-Pres. in charge of engineering.

South Dakota.—Minneapolis & St. Louis R. R.—This company is reported to be planning an extension from Lead or Watertown into Canada. No definite plans have yet been made. A new financial interest has recently been taken into the directorate. R. J. Kenly, Minneapolis, Minn., is Ch. Engr.

***Montana.**—Chicago, Milwaukee & Puget Sound.—A contract for about 18 miles of grading between Lewistown and Hilger has been awarded to J. D. BURKE, Lewistown. E. O. Reeder, Seattle, Wash., is Ch. Engr.

Arkansas.—Stuttgart & Southern Ry. Co.—This company has recently been incorporated to build a railway from Stuttgart southward through Arkansas County to Bayou Meto. Among the incorporators are: J. I. Porter, John L. Ingram, Philip Reinsch, Elliott Tallman, J. W. Underwood, L. E. Morphew, George C. Lewis and others.

Texas.—Kansas City, Mexico & Orient Ry.—This company will shortly issue 50-year 4% first mortgage bonds to the amount of $4,000,000. The proceeds of the issue will be used for the building of the line to connect Alpine, Texas, with San Sostenes, Mexico, now the only large street or road still unbuilt or not in process of construction between Kansas City and Topolobampo on the Pacific Coast of Mexico. The completion of this block and two smaller sections on the road will give another Pacific outlet on the Mexican coast for American systems. The railroad crosses the Southern Pacific at Alpine. A. E. Stilwell, 149 Broadway, New York, N. Y., is Pres.

***Arizona.**—El Paso & Southwestern R. R. Co.—Bids will be received until Sept. 15 for the reconstruction of ten miles of graduation and masonry of the roadbed of the company between Lewis Springs and Fairbank, Ariz., including incidental work. The principal items are approximately: Grading, 285,000 cu. yds.; concrete, 3,000 cu. yds.; foundation excavation, 3,000 cu. yds. work to be done in accordance with plans and specifications on file in the office of Engineer Maintenance of Way, Southwestern Bldg., El Paso, Texas. H. J. Simmons, El Past, Tex., is Gen. Mgr. Mgr.

✚Manitoba.—Canadian Northern Ry.—The contract for the last link between Winnipeg and the Pacific Coast, being the section from Yellowhead Pass to Kamloops, 250 miles, has been awarded to the NORTHERN CONSTRUCTION CO. and the COWAN CONSTRUCTION CO., jointly, at approximately $10,000,000. Work will be started from both ends simultaneously, the time limit for completion being two years.

✚Saskatchewan.—J. D. McARTHUR, Winnipeg, Man., who has been awarded the contract for building the Hudson Bay Ry., has purchased the charter of the Edmonton, Dunvegan & Peace River R. R., and is arranging for surveys for the new road.

ELECTRIC RAILWAYS.

(✚Denotes a contract awarded.)

Bangor, Me.—The Bangor Power Co., recently incorporated for the purpose of acquiring and utilizing the rights, property and franchises of the Bodwell Water Power Co., and which also controls the water power at Basin Mills and Veazie, will eventually be absorbed by the Bangor Ry. & Electric Co. John R. Graham, Pres. of the Bangor Ry. & Electric Co., has been chosen Gen. Mgr. of the Bangor Power Co. A dam at Gilman Falls in the Stillwater branch of the Penobscot River will be built. Surveys are being made.

Little Falls, N. Y.—The Board of Aldermen has granted a franchise to the Little Falls & Johnstown Ry. Co. to construct a trolley line from Little Falls to Johnstown.

Beaver, Pa.—The Beaver Valley Traction Co. has decided to lay new track, also build overhead construction and carhouses.

Delaware Water Gap, Pa.—The Stroudsburg & Water Gap Ry. Co. has petitioned the Borough Council for an extension of its franchise to build an extension of its line. A. A. Holbrook, Stroudsburg, is Gen. Mgr.

Monongahela City, Pa.—The Pittsburg, Monongahela & Washington Ry. Co., Monongahela City, formerly known as the Monongahela & Carroll Street Ry., will probably build an extension between Monongahela and Ellsworth during the next year.

Scranton, Pa.—The Northern Electric Street Ry. Co., Scranton, will build extensions of its lines from Clark's Summit to the Hillside Home and thence to Newton and from Nicholson to Montrose. Richard W. Day, 406 Linden St., Scranton, is Gen. Mgr.

Spartanburg, S. C.—The Greenville, Spartanburg & Anderson Ry. Co. has been incorporated and has made application for a franchise to build an electric railway in this city.

Algiers, La.—The Algiers Ry. & Lighting Co. will extend its Algiers-Gretna line to McLellanville and the Mississippi River, it is reported.

Louisville, Ky.—Application for a franchise has been made by the Louisville Ry. Co. to build its tracks over certain streets in the West End. Surveys, it is stated, have been made for a line between Ornell and Kosmodale. T. J. Minary, 316 West Jefferson St., Louisville, is Pres. and Gen. Mgr.

Chrisney, Ind.—Surveys are being made by the Chrisney, Evansville & Eastern R. R. Co. for a railway connecting Chrisney, Booneville and Lynnville. It is reported that bids for construction will be asked upon the completion of the surveys.

Evansville, Ind.—The Evansville, Henderson & Owensville Traction Co. has incorporated to build ten miles of track between Evansville and Henderson. The company has leased 6½ miles of the Illinois Central tracks. A ferry will be built to carry the cars across the Ohio River. W. M. Whitaker, New York, is Engr.

Lebanon, Ind.—The Circuit Terminal Ry. Co., Danville, Ind., will call for bids for the construction of the second division of its line lying between Lebanon and Sheridan, it is reported, in the near future.

Hibbing, Minn.—The Mesaba Electric Ry. Co., a newly formed incorporation, will let contracts for grading and bridges, it is stated, and will secure necessary rights of way. The line will begin at Hibbing touching Chisholm, Buhl, Mountain Iron, Virginia, Eveleth and Gilbert, about 35 miles. An expenditure of $1,200,000 is estimated.

Omaha, Neb.—The Omaha & Western Iowa Traction Co. has made a survey of a section between Omaha and Sioux City, Iowa, about 100 miles. The route will touch Council Bluffs, Crescent, Honey Creek and through the eastern side of the Missouri Valley. An expenditure of $3,000,000 is estimated. The officers are Frank W. Bacon, Pres. and Treas.; E. T. Hathaway, Vice-Pres.; Daniel G. Cary, Secy., and K. B. Ward, Ch. Engr., Omaha, Neb.

St. Louis, Mo.—The St. Louis & Jennings Ry. Co. has made application at Clayton for a franchise to build a railway from the western limits of St. Louis to the Jennings Station Road.

Dallas, Tex.—The Dallas Southern Traction Co. has filed its charter at the office of the Secretary of State, Austin. Its purpose being to construct, maintain and operate an interurban line connecting Dallas, Waxahachie and Ennis. The incorporators are Edwin B. Parker, J. H. Tallichet and David Daley all of Houston.

Fort Worth, Tex.—The Fort Worth Southern Traction Co. has received a franchise to build a railway connecting Fort Worth, Everman, Burleston, Joshua and Cleburne. Noted July 13.

Oklahoma, Okla.—The Oklahoma Shawnee Ry. Co. contemplates building a 100-mile railway to connect Oklahoma City, Shawnee and Tecumseh, with a branch line to Chandler. This company is a reorganization of the Oklahoma-Shawnee Interurban Ry. Co. L. E. Patterson, Oklahoma City, is Pres.

Pueblo, Colo.—The Pueblo & Suburban Traction & Lighting Co. is planning to make extensions and improvements costing about $2,000,000.

Caldwell, Idaho.—An extension is under consideration by the Boise & Interurban Ry., Ltd., Boise, from Caldwell to Nampa.

Salt Lake City, Utah.—An application has been made by the Utah Light & Ry. Co. for a franchise to build its tracks over East 15th St. and North State St.

Fresno, Cal.—The Fresno, Hanford & Summit Lake Ry. Co. has made application for a franchise to construct an electric railway over I and Tuolumne Sts.

San Francisco, Cal.—The Central California Traction Co. will doubletrack its line on Magnolia Ave. S. L. Naphtaly, 347 Grant Ave., is Gen. Mgr.

LIGHT AND POWER PLANTS.

*(*Denotes that this work is advertised in Engineering News.)*

North Troy, Vt.—The Frontier Electric Co. has recently been organized and has purchased the plant and lighting system from the North Troy Electric & Power Co. to construct a generating plant. A concrete dam will be erected and 800 HP. will be developed.

✚Arlington, Mass.—The contract for the transformer and sub-station for the Boston Elevated Railroad on Water St. has been awarded to CAVANAUGH BROS., Boston. The building will be of brick and concrete, two stories, to cost $30,000. Stone & Webster, 147 Milk St., Boston, are the Engrs.

Boston, Mass.—Bids opened on Aug. 19 at the office of the Bureau of Yards & Docks, Navy Dept., for switchboard feeder panels, to be installed at the Navy Yard, Boston. Specification No. 1807, are as follows: Taunton-New Bedford Copper Co., Taunton, Mass., Item 1, $5,287; Blake Electric Mfg. Co., 1 Rowes Wharf, Boston, Mass., Item 1, $4,083; Youngstown Armature & Construction Co., 113 Market St., Youngstown, Ohio, Item 1, $4,800; General Electric Co., Schenectady, N. Y., Item 1, $3,470, deduct conditionally $125; National Electrical Supply Co., 1330 New York Ave., Washington, D. C., Item 1, $5,280, $4,685; Walker Electric Co., 2338 Noble St., Philadelphia, Pa., Item 1, $4,591; Westinghouse Electric & Mfg. Co., 803 Hibbs Bldg., Washington, D. C., Item 1, $4,070; Item 2, $4,200.

Fall River, Mass.—The Tiverton Electric Light Co., Tiverton, R. I., has been granted a franchise to extend its transmission lines in Fall River.

North Easton, Mass.—The Edison Electric Illuminating Co., Brocton, is planning to extend its transmission lines to North Easton.

✚New Britain, Conn.—The contract has been awarded by the Board of Public of New Britain for the construction of the extension of the subway in Arch St. to the SAFETY INSULATION WIRE & CABLE CO., New York, for $20,070. Other bidders were: Cantrell Construction Co., Philadelphia, Pa., $37,812.50; J. M. McLeod Co., New York (bid withdrawn); L. C. Baker, New Britain, Conn., $22,202.50; Pierson Eng. & Cons. Co., Bristol Conn., $22,500. The Court of Common Council has not yet ratified the award.

✚Plainville, Conn.—The Trumbull Electric Mfg. Co. has awarded a contract for installing the power plant in its new power-house to the SHAFFER MARSH CO., Bristol, Conn.

New Haven, Conn.—A conduit system will be installed in certain streets at Yale University for the accommodation of the new buildings erected on Pierson-Sage Square. A heating plant will be located on Pierson-Sage Square. A total expenditure of $500,000 will be made.

✚New York, N. Y.—A contract has been awarded to the NEW YORK CONSTRUCTION CO., 1328 Broadway, at $37,840, for the electric work in the Washington Irving High School at Irving Place, 16th and 17th Sts. Bids were opened on Aug. 21 by C. B. J. Snyder, Supt. of School Buildings, Dept. of Education, Park Ave. and 59th St.

Hartwick, N. Y.—The Public Service Commission has granted the Hartwick Power Co. permission to erect poles and wires for lighting purposes.

Johnstown, Pa.—Plans are being made to secure electricity from the Cambria Steel Co. as the motive power for operating the Cambria Incline Plane.

Lewisburg, Pa.—The Citizens' Co., Lewisburg, newly organized has decided to increase its capital for the purpose of constructing an electric-light plant. An expenditure of $30,000 will probably be made.

Scranton, Pa.—A power plant will be installed in the basement of the Globe Warehouse on Wyoming Ave. The plant will be used to run the elevators and light and heat the building.

✚St. Clare, Pa.—A contract has been awarded to the C. C. BOWER CONSTRUCTION CO., Philadelphia, for the erection of a power-house to be located at Saint Clare for the Philadelphia & Reading Ry. Co.

Philadelphia, Pa.—Bids will be received until Aug. 25 by James F. Hasskarl, Acting Dir. Depart. of Wharves, Docks and Ferries, for electric freight elevators for the Vine St. pier.

A permit has been given to the H. E. Gran Co. for the erection of a $10,-

BUSINESS NEWS OF THE WEEK.

Labor conditions continue to be the chief topic of interest. The strikes in Great Britain have been more widespread, but the complete tie-up on the railways was not effected; neither has this strike been satisfactorily settled. Labor conditions there are still very much mixed, but the Government has taken the stand that no rioting will be permitted and so far has put a stop to any serious disturbances. In America news is quite conflicted. The Harriman-Pacifics are reported to be laying off several thousand men. The Illinois Central is negotiating with its men.

Railway gross earnings all over the country are falling off. The Interstate Commerce Commission figures that on roads having a mileage of 223,000 in June, 1911, the gross earnings were $215,000,000, a falling off of $7,000,000 or 3.2% compared with last year. Operating expenses likewise decreased, although not in as large a ratio as the net earnings of $69,000,000 were smaller by $3,780,000 than in June, 1910, a decrease of 3.9%. The decline was apparently general throughout the country, although both the gross and net earnings in the New England states and the Southern states showed an increase compared with last year. The most serious falling off was in the Northwest, due chiefly to the crop failure last year, and this accounts for 70% of the decrease in gross earnings and over 95% in net.

Employment agencies in New York are looking for laborers but are unable to find as many as desired who want to work for $1.60 per day of eight hours.

Congress adjourned Aug. 22 after passing but two measures of importance—the Reciprocity Bill and the Statehood Bill.

Railway equipment orders have been more numerous, particularly on the Eastern roads.

000 power-house, on the south side of Chester Ave., west of 59th St., for the Presbyterian Orphanage. Concrete and brick will be used for the construction of the building.

Weatherly, Pa.—An electric light plant, it is stated, will be built here at a cost of $12,000.

✚**Washington, D. C.**—A contract has been awarded to D. J. BRAUN MFG. CO., Washington and Union Sts., Chicago, Ill., for installing lighting fixtures in the post-office buildings at Austin, Minn., Clinton, Mo., Decorah, Iowa, Kokomo, Ind., Litchfield, Neb., and Plattsmouth, Neb.

✚A contract for installing lighting fixtures in the U. S. post-office building at Beloit, Wis., Austin, Tex., and Fremont, Neb., has been awarded to the GAS FIXTURE & BRASS CO., Cleveland, Ohio.

Lawrenceville, Va.—Plans and specifications are being prepared by J. B. McCrary Co., 1211 Empire Bldg., Atlanta, Ga., for construction of a municipal electric plant, sewer system and water-works. A bond issuance of $50,000 has recently been voted.

Honea Path, S. C.—Bids will be received by the Board of Public Works, Honea Path, S. C., until noon, Sept. 5, for furnishing machinery, boilers, pumps, engines, etc., and materials for electric light plant and for cast-iron water pipe, valves, lead, etc., and tank for water plant; also for deep well. Blanks furnished on application to Thos. W. Cothran, Consult. Engr., Greenwood, S. C. John F. Monroe is Chn. of the Bd.

Tampa, Fla.—The Tampa Gas Co. is preparing to build a new gas tank, to have a capacity of 700,000 cu. ft. of gas to be 150 ft. high and 125 ft. diameter.

Clarksdale, Miss.—Bids will be received by W. S. Boles, City Engr., until Sept. 5 for extending and improving the electric lighting, water-works and sewer systems. Cost, $55,000.

Knoxville, Tenn.—The Eastern Tennessee Piwer Co., Parksville, has made application to install a lighting system.

✚**Mount Vernon, Ohio.**—A contract for feeder wires and yard lights for the Ohio State Sanatorium for which bids were opened Aug. 12 has been awarded to ERNER HOPKINS CO., 55 E. Chestnut St., Columbus, Ohio, at $10,299 with a $5,320 deduction for the alternating generators.

Payne, Ohio.—An electric light and water-works system will probably be installed. A vote to issue bonds to be used for this purpose has been carried. The cost of the electric light plant is estimated at $9,700 and the water-works at $17,000.

Worcester, Ohio.—A plant is to be installed at the Experiment Station, for which bids will be asked later. The cost is estimated at $10,000.

Lima, Ohio.—Bids will be received until noon, Sept. 15, by George E. Whitney, Secy. of the Comn., for 1,600-HP. water-tube boilers in 200-HP. units; six engines ranging from 135 to 265 HP.; six generators ranging from 75 KW. to 150 KW.; an eleven-panel switchboard and the usual equipment of heaters, pumps and pipe. Plans are on file at the office of the Architect and at the office of J. G. Lorimer, Supt. of Constr., at the building site near Lima, Ohio. F. L. Packard, 1214 New Hayden Bldg., Columbus, Ohio, is Arch.

Gary, Ind.—The Board of Public Works has granted a franchise to T. B. Dean, Chicago, for a central heating plant to supply both business and residence buildings. Bids will be asked for in the near future.

Elkhart, Ind.—The Indiana & Michigan Electric Co. is planning extensive improvements. An expenditure of $500,000 will be made.

Detroit, Mich.—The Consolidated Light & Power Co. has been organized for the purpose of erecting and operating hydroelectric plants on the Chippewa River. Midland, Ionia, St. Johns, Ithaca and Mount Pleasant will probably be supplied with power. Two dams across the Chippewa River are owned by this company and seven more are contemplated. J. L. Hudson is Pres.; Charles S. Abbott is Vice-Pres. and Gen. Mgr.; Robert Tannerhill is Secy., and F. R. Ross is Treas.

Ishpeming, Mich.—A plan to overhaul the municipal electric-light plant is being developed. The transmission lines will be extended from the power plant to the plant owned by the Cleveland-Cliffs Iron Co. at the Maas mine.

Manistee, Mich.—The Manistee County Electric Co. has been granted a franchise to furnish the city with electricity. A dam over the south branch of the Manistee River will be started within three months, it is reported.

Chicago, Ill.—The Chicago Suburban Edison Co. has recently absorbed the Economy Light & Power Co., Joliet, Ill.; the North Shore Electric Co., Chicago, Ill.; the Illinois Valley Gas & Electric Co., Streator, Ill., and the Kankakee Gas & Electric Co., Kankakee, Ill. Two or three generating plants will be built, it is stated. It is proposed to utilize the water rights owned by the Economy Light & Power Co.

DeKalb, Ill.—An ornamental street-lighting system is being considered.

✚**Monmouth, Ill.**—The Western Stoneware Co. has awarded a contract to the MONMOUTH PUBLIC SERVICE CO. for electrical equipment to be installed in its plant No. 1.

Mascoutah, Ill.—A bond issue of $12,000 has been voted for the construction of a municipal electric light plant.

Paxton, Ill.—The construction of an electric light plant is contemplated. It is reported a bond issue of $17,000 has been voted.

Mendota, Wis.—The Wisconsin State Board of Control has rejected all bids for the installation of a heating plant in the new power-house at the State Hospital for Insane.

Rondom Lake, Wis.—The installation of an electric light system has been voted.

Douds Leando, Iowa.—The Des Moines River Power Co. has prepared plans for the construction of two dams near here which will develop 2,000 HP. each.

Brown Valley, Minn.—A contract has been awarded to the MINNEAPOLIS STEEL & MACHINERY CO., 29th and Minnehaha Sts., Minneapolis, for the construction of an electric light plant.

✚**Greensburg, Kan.**—A contract for building the power-house for the Municipal electric lighting company has been awarded to J. G. HEWITT.

Curtis, Neb.—Plans are being completed for the installation of a municipal electric light plant. Charles F. Sturtevant is in charge.

✚**Brainard, Neb.**—A contract for erecting an electric light plant and installing a water-works system has been awarded to the ALMO ENGINE & SUPPLY CO., Omaha, Neb., at $10,713.

✚**Wymore, Neb.**—A contract for the construction of a 10-mile distributing and street lighting line for which bids were opened Aug. 9 has been awarded to the COLUMBIAN ELECTRICAL CO., St. Josepn, Mo., at $8,303.

Brookings, S. Dak.—Bids will be received until Sept. 6 by the County Commissioners for all metal and composition light fixtures for the Court-House. O. J. Otternes is County Auditor.

Butte, Mont.—The Butte, Anaconda & Pacific Ry. Co. has decided to operate its lines with electricity. About $1,000,000 will be expended.

Branson, Mo.—Preliminary surveys are being made by J. A. Laird and M. L. Holman for the purpose of locating a site for the White River dam and hydroelectric plant to be built about five miles from Branson. A transmission to Springfield, about 35 miles, is contemplated.

✚**Elephant Butte, N. Mex.**—A contract for furnishing electric power plant and equipment has been awarded to W. E. Anderson at $100,000.

Las Cruces, N. Mex.—See item under Water Supply—Irrigation.

Riverdale (Ogden post-office), **Utah.**—Bids will be received until Aug. 31 by the Davis & Weber Counties Canal Co., 316 First National Bank Bldg., Ogden, for the construction of a hydroelectric power plant. Plans and specifications may be seen at the office of the company.

Ely, Nev.—The Telluride Power Co. has prepared plans for a power plant on the Cleve Creek, to develop about 3,000 HP. P. N. Nunn, Provo, is Cn. Engr.

Jarbidge, Nev.—A company has been formed with the intention of building an electric-light and power plant at the new camp of Jarbidge to furnish power for the mines and mills. Gilmore Kinney, Jr., J. M. Kinney, J. T. Braun and George F. Elliott, all of Jarbidge, are the organizers.

Tucson, Ariz.—Plans for the installation of an electric power and irrigation system near Noria, Sonora County, Mex., which, in addition to supplying electrical energy for the operation of four mines and smelters, will furnish electricity for lighting the Llano and water for the irrigation of about 15,000 acres of land. A reservoir will probably be built near Noria.

✚**Phoenix, Ariz.**—Contracts have been awarded by Charles A. Van der Veer, Secy, of the Salt River Valley Water-Users Association, for power plant equipment as follows: Turbines, S. MORGAN SMITH CO., $11,500; General Electric Co., Schenectady, N. Y., $15,462; the Westingnouse Electric & Mfg. Co., $20,525; Switchboard, WESTINGHOUSE ELECTRIC & MFG. CO., $3,222. The Allis-Chalmers Co., Milwaukee, Wis., bid $39,765 for turbines and generators.

Olympia, Wash.—A right-of-way has been secured by the Olympia Light & Power Co. for a transmission line from the new reservoir to be erected at Lawrence Lake to Olympia. The total expenditure will be approximately $300,000. L. B. Faulkner, this city, is Mgr.

Spokane, Wash.—The International Power & Mfg. Co. has been incorporated for the purpose of constructing a dam across the Spokane River at the site of the new paper mill at Millwood. The incorporators are W. S. Yearsley and Martin H. Gerry, Jr.

Stevenson, Wash.—A new company will probably be formed to be known as the Cleom Tumwater Light & Power Co., for the purpose of building a plant on the Wind River, about 18 miles north of Stevenson. A development of 6,000 HP. can be made. E. P. Ash and S. Samson are interested.

Mosier, Ore.—The Pacific Light & Power Co. is considering building a transmission line to Mosier.

Klamath Falls, Ore.—A power plant will be installed at the new mill being constructed by the Pellican Bay Lumber Co. About 800 lights will be installed.

Portland, Ore.—The Mt. Hood Ry. & Power Co. has under consideration plans for the construction of a sub-station at the foot of Williams Ave. The cost is estimated at $60,000.

Sacramento, Cal.—Bids were opened on Aug. 12 by N. Ellery, State Engr., for electric conduit and wiring system to be installed on the Capitol Grounds and all were rejected. The bids were as follows: Kalenborn & Paul, $17,480; C. Newberry-Bendheim Electric Co., $14,600; C. Atwell, $15,705.

Stanton, Cal.—The installation of an electric light and water system is under consideration.

Colusa, Cal.—The County Supervisors of Colusa County have granted a franchise to the Northern California Power Co. for its power lines and service through the county.

Los Angeles, Cal.—The highest and lowest bid received by the Board of Supervisors for the installation of engines in the Hall of Records were submitted by J. F. Connell, $15,725, and Charles Moore Co., $21,658.

Los Angeles, Cal.—Bids will be received by the High School Board of the Los Angeles District until Aug. 24 for furnishing and installing two water tube boilers at the Manual Arts high school, and two 125-HP. horizontal return tubular boilers at the Los Angeles High School. William A. Sheldon is Secy.

Madera, Cal.—The San Joaquin Light & Power Co. will build a transmission line from Madera to Los Banos. A branch line will be run from a point on the line between Dos Palos and the river to a point three miles west of Mendota where a sub-station will be located. Another sub-station will be located at Los Banos. James Berryman is in charge at Dos Palos.

✚**Vallejo, Cal.** — The Bureau of Yards and Docks, Navy Dept., Washington, D. C., has awarded contract for the equipment of a power plant at Mare Island to JOHN W. DANFORTH & CO., Buffalo, N. Y., at $104,420.

Oroville, Cal.—The Pacific Gas & Electric Co. has made surveys for a storage reservoir covering about 700 acres on the Oregon House Creek in Yuba County. The total cost of the project will be $1,000,000. G. C. Holburton, 445 Sutter St., San Francisco, is Ch. Engr.

✚**Redondo Beach, Cal.**—The Pacific Light & Power Co. has awarded the following contracts: H. R. BOYNTON CO., 644 South Spring St., Los Angeles, at $11,610, for furnishing and installing piping for steam, water and oil at its plant at Redondo Beach; BEST MFG. CO., Pitsburg, to do erection work for contractor, valves and steel pipe.

Tulare, Cal.—The Tulare Power Co. will build an auxiliary power plant on the Truckee River, it is stated. W. E. Caffrey is in charge.

St. Jerome, Que.—Bids will be received until noon, Aug. 28, for a complete hydroelectric power and distribution system. Total estimate, $60,000. Specifications may be secured at the office of deGaspe Beaubien, Consult. Engr., 112 St. James, Montreal.

Winnipeg, Man.—Bids will be received by the Chairman of the Board of Control at the office of M. Peterson, Secy., until 11 a. m., Aug. 28, for the manufacture, delivery and installation of underground cable for the electrical distribution system. Specifications may be obtained at the office of the General Manager of the Light and Power Department, 449 Main St., Winnipeg.

✚**Revelstoke, B. C.**—A contract for constructing the second flume at the Municipal power plant has been awarded to the PACIFIC COAST PIPE CO., Vancouver, at $7,425.

Panama.—See item under U. S. Possessions and Cuba.—Turbo-Generator, Panama.

Hawaii.—See item under U. S. Possessions and Cuba—Power Plant, Hawaii.

BRIDGES.

(✚*Denotes a contract awarded.*)

✚**Hinckley, N. Y.**—The contract for constructing a concrete bridge at Hinckley has been awarded to the OWEGO BRIDGE CO., at $9,465.

Kingston, N. Y.—Bids will be received by the Board of Water Supply, 165 Broadway, New York, until 11 a. m., Sept. 5, for constructing two reinforced-concrete arch bridges and four reinforced concrete girder bridges, with approaches in connection with the system of highways around Ashokan reservoir. Charles Strauss is Pres.

Port Chester, N. Y.—The Board of Supervisors of Westchester County will receive bids until Sept. 11 for widening a masonry bridge over the Byram River at Port Chester.

✚**Schenectady, N. Y.**—The FOUNDATION CO., 115 Broadway, New York, has been awarded the contract for constructing piers for the bridge over the Mohawk River at Schenectady, N. Y., for the Delaware & Hudson Co. The work consists of four river piers, carried down to hard pan, at an average depth of 37 ft. below water level; also two abutments on land. The piers will average in size 17 ft. 6 in. x 70 ft., and the abutments are 10 ft. x 19 ft.

✚**Connellsville, Pa.**—The contract for constructing a bridge on the Mason-town-Morgantown extension of the West Penn Rys. has been awarded to JOHN EICHLASY, JR., of Pittsburg, Pa., at $15,000.

Pittsburg, Pa.—The following bids were received by Joseph G. Armstrong, Dir. of Pub. Wks., for the steel work for the Point Bridge: McClintic-Marshall Co., $353,000; Pennsylvania Steel Co., $370,000; Fort Pitt Bridge Co., $338,434; American Bridge Co., $297,792.

✚The contracts for bridge work have been awarded by Joseph G. Armstrong, Dir. of Pub. Wks., as follows: Steel work on Union Bridge to the AMERICAN BRIDGE CO., at $297,[illegible]; concrete span for the Atherton Ave. Bridge, to C. M. DRIVER, at $91,379.

✚We are officially advised that the contract for improvements on Bridge No. 4 across Chartiers Creek has been awarded to M. O. HAGAN and T. McLAUGHLIN, at $24,791. Other bids were: A. F. Abel, $42,937; Reinforced Concrete Construction Co., $31,862; Lewis & Wood, $40,019; C. M. Driver, $34,224; C. M. Neeld Construction Co., $34,139; Friday Contracting Co., $31,931; Acme Paving Contracting Co., $43,423. Noted Aug. 3.

Wentworth, N. C.—Bids will be received by the Commissioners of Rockingham County until Sept. 8 for repairing approach to Settle's bridge across Dan River, and to construct bridges to span the following streams: Big Beaver Island Creek at Madison; Haw River, Little Troublesome Creek, Hogan's Creek at Dalton's, Lick Fork Creek at Ruffin. J. P. McMichael is Clk. Rd. Comrs.

Wanilla, Miss.—Bids will be received by W. H. Speight, Clk., until 2 p. m. Sept. 4, for constructing a steel bridge across Fair River on Rockport Road.

Lake Charles, La.—The city has decided to construct a bridge over Calcasien River to cost $100,000.

✚**Elizabethtown, Ky.**—The contract for constructing the Salt River bridge at West Point has been awarded to the CAPITAL CONSTRUCTION CO., of Columbus, Ohio, at $[illegible],300.

Barberton, Ohio.—Bids will be received by the Board of County Commissioners until Sept. 6 for constructing a bridge over Wolf Creek, Wooster Road. Charles L. Wirth is Clk.

✚**Cincinnati, Ohio.**—We are officially advised that the contract for the superstructure of Gilbert Ave. viaduct complete has been awarded to KAPS-BOEHM CO., Cincinnati, at $144,399. Other bids were: L. Eid Concrete Steel Co., Cincinnati, $162,800; Crawford Construction Co., Cincinnati, $149,679; T. P. Strack, Cincinnati, $169,612; Kirchner Construction Co., $191,000; P. W. Folz & Co., Cincinnati, $170,200; P. J. Brockett, Cincinnati, $187,000; Ferro Construction Co., Cincinnati, $159,276. Noted on June 29.

Bids will be received by the Board of County Commissioners until noon, Sept. 8, for constructing culverts, bridges and retaining walls on the Clough Creek Pike in Anderson Township. Fred Dreihs is Clk.

✚**Indianapolis, Ind.**—The contract for constructing a bridge over Eagle Creek at Washington St. has been awarded to the RELIABLE CONSTRUCTION CO., of Indianapolis, at $22,466.

Laporte, Ind.—Bids will be received by the Commissioners of Laporte County until 10 a. m., Sept. 7, for constructing an iron bridge over the Kankakee River and a concrete arch culvert in New Durham Township. F. A. Haushur is County Audr.

Wabash, Ind.—The Commissioners of Wabash County have appropriated $30,000 for the construction of a new bridge over the Wabash River at Huntington St. J. P. Noftzger is County Audr.

Clayton, Ill.—Bids will be received by S. D. Hyler, Town Clk., until 2 p. m. Aug. 26, for constructing a reinforced-concrete bridge in Clayton Township.

New Athens, Ill.—Bids will be received by D. M. Fullmer, Town Clk., until 10 a. m., Sept. 2, for constructing a reinforced-concrete bridge in New Athens Township.

Rockford, Ill.—Bids have been received by the Council Commission on Streets for constructing a concrete bridge across Keith Creek, as follows: Beckstrom & Bergeson, Rockford, $8,426; O. D. Corey, Rockford, $10,990; J. H. Sabin, Rockford, $11,295; Wm. H. Shons, Freeport, $11,960; Gust. Holm, Rockford, $12,678.

✚**Hudson, Wis.**—The CENTRAL STATES BRIDGE CO., Indianapolis, Ind., has been awarded the contract for the construction of a steel span stationary bridge across Lake St. Croix to the Minnesota side. Cost, $29,000. J. C. McGRATH has the contract for filling approaches, etc.

Fort Riley, Kan.—Plans have been completed by the Quartemaster Department for a bridge across the Kansas River to cost approximately $100,000. The plans call for a steel structure, supported on concrete piers with a cement floor.

Kansas City, Kan.—Bids will be received by Frank M. Holcomb, County Clk., until 10 a. m., Sept. 11, for reconstructing the James St. Bridge over the Kansas River. Plans are on file at the office of the County Clerk.

La Crosse, Kan.—Bids will be received by the County Clerk until noon, Aug. 28, for constructing a bridge in Rush County. The bridge is to be of reinforced-concrete construction, consisting of two 27-ft. spans 60 ft. over all; 18-ft. roadway; estimated amount of concrete in superstructure, 69.7 cu. yds.; estimated amount of steel in superstructure, 10,954 lbs.; two concrete abutments 16 ft. high; one concrete pier 16 ft. high; estimated amount of concrete in substructure, 166.1 cu. yds. Excavation will be in clay.

Topeka, Kan.—The Atchison, Topeka & Santa Fe Ry. Co. will construct a new bridge at Sibley where the road crosses the Missouri River. The bridge will be built on the old piers and will cost approximately $1,235,000. C. A. Morse, Topeka, Kan., is Ch. Engr.

✦**St. Louis, Mo.**—We are officially advised that the contract for constructing the third section of the municipal bridge has been awarded to MISSOURI VALLEY BRIDGE & IRON CO., Leavenworth, Kan., at $52,097; and for the fourth section to AMERICAN BRIDGE Co., 30 Church St., N. Y., at $427,297. Noted Aug. 3.

***Angleton, Tex.**—Bids will be received by J. W. Munson, County Judge, Commissioners' Court, Brazoria County, until noon, Sept. 11, for constructing two bridges over Brazos River. Plans are on file at the office of the County Judge.

Lamarque, Tex.—Bids will be received by B. F. Ayers, Chn. Comn. of Galveston County Drainage Dist. No. 2, until 4 p. m., Sept. 1, for constructing several small bridges. E. N. Sanctuary, Galveston, is Engr.

Silver City, N. Mex.—Plans have been approved by the Territorial Engineer, Phoenix, Ariz., for the proposed steel bridge that is to be constructed over the Gila River on the road from Silver City to Mogollon. The structure will cost between $100,000 and $125,000. Noted on July 13.

✦**Flagstaff, Ariz.**—The contract for constructing a bridge across Little Colorado River has been awarded to the MIDLAND BRIDGE CO., Kansas City, Mo., at $84,000.

Portland, Ore.—Plans have been approved by the County Court for a bridge across Bear Creek, to be of reinforced concrete, 239 ft. long. Estimated cost, $30,000.

Colusa, Cal.—Bids will be received by the County Supervisors until 3 p. m., Sept. 5, for constructing three spans of concrete bridge across the Maxwell-Colusa Road.

Los Angeles, Cal.—Bids will be received by the Board of Supervisors until 2 p. m., Aug. 28, for constructing a pile trestle bridge across Little Tujunga Wash in Sundland Road District. H. J. Lelande is County Clk.

Los Angeles, Cal.—Bids will be received by the County Supervisors until Aug. 28 for constructing two concrete culverts, one on Central Ave. and one on Louise St. in Tropico Road District. H. J. Lelande is Clk.

Pasadena, Cal.—The city is contemplating the building of a bridge across Arroyo Seco to cost $200,000.

Salinas, Cal.—Bids will be received by T. P. Joy, County Clk., until 2 p. m., Sept. 6, for a bridge and jetty work throughout the county. Estimated cost is $38,000.

Three Rivers, Que.—Bids will be received by L. T. Desaulniers, Secy.-Treas., until 4 p. m., Aug. 25, for constructing a steel bridge with two concrete abutments on the St. Maurice River to be 200 ft. long. Plans are on file at the office of Benjamin Bourgeois, City Engr.

Newmarket, Ont.—Bids will be received by Frank Barber, C. E., 57 Adelaide St., East Toronto, until noon, Aug. 26, for constructing concrete abutments and a reinforced-concrete truss bridge across Holland River.

BUILDINGS.

Richford, Vt.—Only one bid was received by James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., for the construction of a U. S. post-office at Richford, Vt. H. Merritt Wallis, Beverly, Mass., $56,000.

Canton, Mass.—Bids will be received until Aug. 28 by John E. Fish, Supt. Massachusetts Hospital School for the erection of a general purpose barn and an assembly hall on the hospital grounds. Plans by Samuel W. Mead, 15 Beacon St., Boston.

✦**Worcester, Mass.**—The contract for the 16-tenement block for Levi & Shapiro has been awarded to NATHAN NOVE. To to 27 × 99 ft., 4-story brick. Edwin T. Chapin is the Arch.

A business block for Samuel Wolfson is to be erected at corner of Mechanic and Spring Sts., to be 42 × 79 ft., brick. E. P. Fitzgerald, State Mutual Bldg., is the Arch.

An 8-apartment block is to be built on East Park Terrace for Tomaso Simone, to be 54 × 54 ft., four stories, brick and wood. O. C. S. Ziroli is the Arch.

✦ The J. W. BISHOP CO., 107 Foster St., has been awarded the contract for the $200,000 dormitory at Vassar College, Poughkeepsie, N. Y. Allen & Collins, 40 Central St., Boston, are the Archs.

✦The contract for the apartment block at Main and Downing Sts. for H. Wolf has been awarded to E. WHITEHEAD, 21 Foster St. To be 65 × 78 ft., three stories, brick and wood. Peter J. Doherty, Day Bldg., is the Arch.

Worcester, Mass.—Bids will be received until Aug. 30 by the Trustees of the Worcester State Asylum at the office of Fuller & Delano, Archs., 44 Front St., Worcester, for constructing two buildings in the Grafton Colony.

✦**Amherst Mass.**—The contract for the Morris Pratt Memorial dormitory at Amherst College has been awarded to the H. L. HAMENWAY CO., 48 Custom House St., Providence, R. I., to be of brick, four stories, to cost $150,000. Charles A. Rich, 320 Fifth Ave., New York City, is the Arch.

✦**Boston, Mass.**—The contract for the $50,000 residence of E. V. R. Crosby, on Beacon St., has been awarded to L. D. WILLCUTT & SONS CO., 146 Summer St., to be of brick and stone, six stories, 30 × 121 ft. William Q. Rantoul, 6 Beacon St., is the Arch.

A $60,000 garage is proposed in the vicinity of Grove Hall, Dorchester. Samuel A. Brown is the owner.

A large warehouse and office building is planned by the Brown-Wales Iron Co., to be erected on C and Fargo Sts., South Boston, on the site of their present storehouse. Estimated cost, $300,000. Arthur A. Shurtleff is the Arch.

✦**Brockton, Mass.**—The contract for the storehouse to be built on Montelle St. for Huggons & Co. has been awarded to H. C. BRIGGS, 695 Belmont St. M. D. LONG has the contract for mason work. To be of brick and stone, four stories, 140 × 43 ft., to cost $40,000. George L. Falk, 63 Main St., is the Arch.

East Lexington, Mass.—A 12-room school house, to take the place of the Adams Grammar School, is in contemplation. Edwin A. Bailey is Chn. of Selectmen.

✦**Holyoke, Mass.**—The contract for the business and apartment block to be built for V. V. Goddard at South Hadley Center has been awarded to EDGAR T. HARRIS. D. McCORMICK & CO. have the contract for cut stone work. To be of brick, 48 × 62 ft., three stories. Ellsworth & Howes are the Archs.

✦**Lawrence, Mass.**—The contract for the 5-story brick block on Essex St. for the Oswald Estate has been awarded to E. A. PEABODY & SON.

Lowell, Mass.—A 9-story steel and yellow brick building, 50 × 75 ft., is about to be built for the Daily Sun., on Merrimack St. John M. Harrington is proprietor of the Sun.

Northampton, Mass.—A theatre is about to be built on Pleasant St. for John T. Dewey, to be of brick and stone, 65 × 80 ft., to cost $40,000. B. H. Seabury, Besse Pl., Springfield, is the Arch.

Wakefield, Mass.—The State is about to build an armory, to cost $55,000, to replace the one burned. Adjt. Gen. Gardner W. Pearson is Chn. Armory Comn., Boston.

Cranston, R. I.—A fire station is to be erected, the plans calling for a building 50 × 60 ft., two stories high. Potter & Fuyat, 152 Weybosset St., Providence, are the Archs.

Bridgeport, Conn.—The S. W. HUBBELL BUILDING CO., of this city, has been awarded the contract for a 3-story brick block, 65 × 85 ft., on Water St., for Samuel Hawley, Treas. Bridgeport Savings Bank.

✦**Hartford, Conn.** — The WELLS BROS. CO., of New York City, general contractors for the building of the Hartford National Bank, at Maine and Asylum Sts., have sublet contracts for the steel work to the AMERICAN BRIDGE CO., of New York; ornamental iron work, WHALE CREEK IRON WORKS, Brooklyn, N. Y.; vault work, the REMINGTON & SHERMAN CO. Donn Barber, New York City, is the Arch. Noted July 6.

✦Sub contracts for the tile work, including the floor and wainscoting of 97 bath rooms of the new apartment hotel at High and Church Sts., for Richard J. Dillon, have been awarded to COLLINS & HAYES, of this city, and that for the steel work to the EASTERN BRIDGE & STRUCTURAL CO., Worcester, Mass. O'NEIL & SWENSON, of this city, are the general contractors and L. D. Bayley is the Arch. Noted Aug. 10.

South Manchester, Conn.—Plans are being completed by E. N. & R. E. Spaulding, of Suffield, Conn., for a new building for the Odd Fellows' Building Association of Manchester. It will be of brick two stories high, 60 × 100 ft., arranged for stores, offices and lodge rooms.

Waterbury, Conn.—Three apartment blocks are to be erected for John I. Fernandez on Porter St., to be three stories, 33 × 75 ft., to cost $40,000. Freney & Johnson, 51 Leavenworth St., are the Archs.

✦**Bristol, Conn.**—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded contract for the construction of a U. S. post-office at Bristol, Conn., to the KING LUMBER CO., Charlottesville, Va., at $51,425.

New York, N. Y.—Plans have been completed by Samuel Sass, 32 Union Sq., for the construction of a 6-story apartment house, 102.2 × irregular. The Dayton Realty Co., 826 Kelly St., is the owner. The building will be located at Ft. Washington Ave. and 160th St. The estimated cost is $150,000.

Plans have been filed by Gaetan A. Jello, Arch., 1 West 34th St., for the construction of a 12-story elevator apartment house at Riverside Drive and 114th St. The A. C. & H. M. Hall Realty Co., 3875 Broadway, is owner. The probable cost is $1,000,000.

Plans have been prepared by Cram, Goodhue & Ferguson, 170 Fifth Ave., for the construction of a church parish house and rectory at 155th St. and Broadway for the Church of the Intercession, Trinity Parish, 187 Fulton St. Cost, about $800,000.

Plans have been prepared by N. Sevraleno, 1170 Broadway, for the erection of a 6-story tenement, 25 × 99 ft. Miss Julia M. Coffey, 325 West 137th St., is the owner. The structure will cost $37,000.

The Hamilton Holding Co., 149 Broadway, will make extensive alterations to the 5-story tenement building at 300 East 77th St. Plans by R. Prager, 149 Broadway.

Plans will soon be prepared by Schwartz & Gross, 347 Fifth Ave., for the construction of an 8-story elevator apartment building for Julius Tishman, 209 Broadway. The cost is about $300,000.

Plans have been prepared by Rouse & Goldstone, 38 West 32d St., for the construction of a 12-story apartment, 50 × 81 ft., at 747-751 West End Ave. The cost is $175,000.

***New York, N. Y.**—Bids will be received by the State Board of Armory Commissioners, 174 State St., Albany, N. Y., until noon, Aug. 25, for alterations and new revolver range, consisting of construction, electric and gas work (no heating or plumbing work required) in the 23rd Regiment Armory, Brooklyn, N. Y. Frank A. McNeely is Secy.

✦**Schenectady, N. Y.**—THE DUROLITHIC CO., 460 Ellicott Sq., Buffalo, N. Y., has been awarded the contract for the U. S. post-office at Schenectady, N. Y., by J. Knox Taylor, Superv. Arch., at $124,494, to be constructed of granite, limestone, steel framework and reinforced concrete.

✦**Binghamton, N. Y.**—The contract has been awarded to JAMES O'NEIL, Binghamton, at $49,428 for the erection of a parochial school for St. Patrick's Roman Catholic Congregation.

Mechanicville, N. Y.—A church building will be erected by St. Paul's Roman Catholic congregation. The building will cost $135,000.

Buffalo, N. Y.—St. Gerard's Catholic congregation filed plans for a $85,000 church edifice at 1172 East Delavan Ave.

***Malone, N. Y.**—The bids received on Aug. 16 by the Board of Managers of the Northern New York Institution for Deaf Mutes at Malone, N. Y., for the work of constructing administration building, including alterations to existing rear extensions, two dormitory buildings for boys and girls were: Fiske-Carter Construction Co., Worcester, Mass., $147,566; Charlebois Bros., Watertown, N. Y., $124,500; Proctor Mfg. Co., Ogdensburg, N. Y., $132,000; R. Richards & Sons, Utica, N. Y., $130,289; M. Kantrowitz, Albany, N. Y., $122,000; Wills & Marvin Co., New York, $125,000; W. S. Robertson, Saratoga, N. Y., $135,864; C. H. Everett, Buffalo, N. Y., $124,900; Peter Keeler Building Co., Albany, N. Y., $129,799. All bids were rejected. Plans will be modified. Noted Aug. 3. F. B. Ware is State Arch.

Newburgh, N. Y.—Plans for a Y. M. C. A. building on Grand St., near Broadway, have been accepted and approved. They were drawn by Jackson & Rosencrans, of New York, and F. E. Estabrook, of Newburgh.

Jamesburg, N. J.—Bids will be received until Sept. 6 by the Board of Managers, State Home for Boys, Jamesburg, for constructing a home.

Jersey City, N. J.—The Fagan Iron Works, Jersey City, has acquired a site adjoining the present works and is planning the erection of an office building, warehouse and other structures.

Elizabeth, N. J.—Bids will be received until 2 p. m., Sept. 14, at the Union County Court House for the erection of a sanitarium. Bids will be received for construction and engineering. J. Oakley & Son, 280 North Broad St., are Archs.

Pittsburg, Pa.—Bids will be received until Sept. 6 by W. A. Bode, Secy. Comrs., for the construction of a municipal building for Baldwin Township. Plans and specifications may be seen at the office of R. Berg, Jr., 304 Phillips Ave., Carrick, Pa.

Pine Grove, Pa.—Plans have been made for a 3-story building at Mifflin and Morris Sts. by the Record Publishing Co. On the third floor will be a large hall which will be given over to the use of lodges.

Clayville, Pa.—Bids will be received until Aug. 24 by Frank L. Knox, M. D., Secy. Bd. of Educ., for erecting an 8-room fireproof school.

Oakmont, Pa.—Bids will be received until Aug. 25 by C. M. C. Campbell, Secy. School Bd., for the erection of a school at Fifth and East Sts. Plans by G. H. Schwan, Peoples Bank, Pittsburg.

✦**Philadelphia, Pa.**—JOHN R. WIGGINS & CO. will erect a 3-story brick and stone parochial school, 73 × 64 ft., at the southwest corner of 19th and Atlantic Sts., for the Holy Souls' Catholic Congregation. The cost will be about $50,000. Plans by E. F. Durang & Son.

Bids will be received by John E. Reyburn, Mayor, until Aug. 31 for erecting an auditorium in East Fairmount Park. Plans by John T. Windrim, Arch., 1501 Commonwealth Trust Bldg. The available appropriation is $1,500,000.

Pittsburg, Pa.—Press reports state that the Thompson-Starrett Co., New York City, will erect a 40-story building in Pittsburg. The probable cost will be about $2,500,000. The building will be located at Fifth Ave. and Wood St.

✦The contract has been awarded to THOMPSON-STARRETT CO., New York City, for the construction of a theatre on Diamond St. The building will measure 90 × 120 ft. with a height of 85 ft. and will have a seating capacity of 2,500. It will be of brick, steel and terra cotta construction. The cost of the structure will reach $125,000.

Uniontown, Pa.—Seymour Davis and Paul A. Davis are planning a $150,000 fireproof Y. M. C. A. building to be erected in Uniontown, Pa.

Baltimore, Md.—Glidden & Friz, 16 St. Paul St., have been commissioned to prepare plans and specifications for an apartment house at Eutaw Pl., near Druid Hill Park, for A. Bondy, 1933 Madison Ave., 10-story, brick, slate roof; cost, $200,000.

Board of Awards, James H. Preston, Mayor, City Hall, will open bids on Aug. 30 for construction of Public School 63, corner Westwood Ave. and Rosedale St.; plans prepared by Thos. C. Kennedy. Contractors estimating are J. L. Robinson, Fidelity Construction, John Cowan, Inc., P. J. Cusnen, Maryland Contracting Co., M. C. Davis, C. L. Stockhausen, R. B. Mason, all of Baltimore.

Bedford City, Va.—Benevolent and Protective Order of Elks, F. L. Robinson, Nat. Secy., Dubuque, Iowa, will erect home for aged and infirm Elks. Brick construction, steam heat, gas and electric lighting, plumbing.

Norfolk, Va.—The Southern Produce Exchange will erect office and store building at Commercial Pl. and Water St.; cost about $40,000; will be of brick construction.

Norfolk, Va.—Benevolent and Protective Order of Elks will, it is reported, erect lodge building at College Park; will be of brick and stone construction, steam heat, four stories.

Clarksburg, W. Va.—Preparations have been made by the Board of Education of Clark District for the erection of modern school building at Union Heights.

Clarksburg, W. Va.—Wyatt & Nolting have completed plans for the erection of a bank and office building at Clarksburg, W. Va., for the Union National Bank. The building will be ten stories high, of granite, terra cotta and brick, with Indiana limestone trimmings. Three electric plunger elevators will be installed.

✦**Huntington, W. Va.**—The contract has been awarded to TAYLOR & ROBINSON, Huntington, by the Chesapeake & Ohio Ry. Co., for the erection of a depot.

Wheeling, W. Va.—It is reported that J. E. Stifel Co., of North Wheeling, is preparing to construct a structural iron warehouse, adjoining the calico factory.

Atlanta, Ga.—The following bids were received by the Board of County Commissioners on Aug. 10 for construction work on the proposed courthouse: For steel work, Massillon Bridge & Structural Co., Massillon, Ohio, $131,000. Reinforced-concrete structure were: Ferro Concrete Construction Co., Cincinnati, Ohio, $168,880; Standard Concrete Construction Co., Chicago, Ill., $144,800; Industrial Engineering Co., Atlanta, Ga., $153,245; Cranford Construction Co., Cincinnati, Ohio, $172,158; Southern Ferro Concrete Co., Atlanta, Ga., $147,000; Moise DeLeon, Atlanta, Ga., $122,000.

Jacksonville, Fla.—Bids will be received until Sept. 4 for constructing a 2-story reinforced-concrete and brick office building at Main and Orange Sts.

Covington, La.—Bids will be received until Sept. 2 by the Covington Bank & Trust Co. for constructing a 2-story brick bank building. Plans by W. Drago, 1002 Perrin Bldg., New Orleons.

✦**Lake Charles, La.**—The contract has been awarded to De Latte & Lagrange for the construction of a city hall at $39,740.

Newport, Ky.—Bids will be received until Aug. 31 for constructing St. Stephen's School on Washington Ave. near Ninth St. Anton Riegs, 2554 Vine St., Cincinnati, Ohio, is Arch.

Avondale (Cincinnati P. O.), **Ohio.**—Bids will be received by the Board of Trustees, Pub. Library, School Dist. of Cincinnati, until Sept. 5 for constructing a Carnegie Branch Library at Mann Pl. and Reading Rd., Avondale.

Canton, Ohio.—Bids will be received until Aug. 24 by the Board of Education for constructing a 12-room fireproof school.

Clyde, Ohio.—Bids will be received until Sept. 5 by the State Armory Board, Columbus, for constructing an armory at Clyde. William M. Scofield, Schofield Bldg., Cleveland, is Arch.

Cincinnati, Ohio.—A 10-story store and hotel building will be built at 112-116 Sixth Ave., East. David J. Dichson is owner.

Dayton, Ohio.—Bids will be received by A. F. Shepherd, M. D., until Aug. 29 for the construction of a dairy barn for the Dayton State Hospital. Plans by W. E. Ross, Arch., Dayton.

✚**Ironton, Ohio.**—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded contract for the construction of a U. S. post-office building at Ironton, Ohio, to EDWARD HENRY, Catlettsburg, Ky., at $68,390.

Massillon, Ohio.—Bids were received as follows on Aug. 16 by James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., for the construction of a U. S. post-office at Massillon, Ohio, (a) limestone, (b) sandstone: George W. Steles Construction Co., Chicago, (a) $92,600; Merrick Fireproofing Co., New York, (a) $69,000, (b) $70,600; King Lumber Co., Charlottesville, Va., (a) $79,800, (b) $82,800; Interstate Construction Co., Saginaw, Mich., (a) $73,299, (b) $73,299; Barenes Bros., Logansport, Ind., (a) $81,340, (b) $84,000; John G. Unkefer & Co., Minerva, Ohio, (a) $75,816, (b) $77,800; Holladay & Crouse, Greensboro, N. C., (a) $74,809, (b) $75,809; James de Vault, Canton, Ohio, (a) $69,627, (b) $71,627.

Washington, Ohio.—The Board of Education has accepted the plans submitted for the high school building, to cost $90,000.

Wooster, Ohio.—Bids will be received until Aug. 29 by the Ohio Agricultural Experiment Station, to construct a fireproof addition to its main or administration building.

Xenia, Ohio.—The Masons have purchased a site and will erect a large Masonic temple, it is reported.

Cleveland, Ohio.—The City Hall Commission rejected all bids for inside steel construction at the City Hall and voted to readvertise.

Lafayette, Ind.—A lease has been secured by M. Schultz on the northwest corner of Fourth and Main Sts. and will construct a building. The cost is about $60,000. The building will be five stories high and of fireproof construction.

South Bend, Ind.—Plans and specifications are on file at the office of Engineering News, New York, for the construction of a high school. Bids will be received until Aug. 29 (extension of date from Aug. 21).

Brazil, Ind.—The Commissioners of Clay County have made a requisition for $200,000 for the construction of a new court house. Plans and specifications will be drawn at once and the contract let as soon as possible.

Waldron, Ind.—The Trustees of the Methodist Episcopal Church will soon ask for bids for the erection and completion of a church.

Vincennes, Ind.—The Vincennes & Southeastern Traction Co. is preparing to build a passenger station and car shops in this city and a large car barn in Petersburg.

Alpena, Mich.—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded contract for the construction of a post-office at Alpena, Mich., to JAMES CORSE, Racine, Wis., at $81,825.

✚**Iron Mountain, Mich.**—The contract has been awarded to CHARLTON & KUENZLI, 423 Camp Bldg., for the erection of a school building and power-house. Plans by Foster Construction Co., 303 Casewell Bldg., Milwaukee, Wis. The cost is $85,000.

Detroit, Mich.—H. J. Rill, 54 Buhl Bldg., Detroit, has awarded iron work contract for the 2-story and basement dormitory, 80 × 150 ft., for the Polish Seminary, Rev. I. Buhackowsky, Orchard Lake, Mich., to RUSSELL WHEEL & FOUNDRY CO., Chene St. and Belt Line R. R.

✚Spier, Rohns & Gehrke, 1325 Chamber of Commerce Bldg., Detroit, have awarded the following contracts for a printing building, four stories and basement, 75 × 138 ft., for John Bornman & Son, 12 Larned St.: Structural iron work let to RUSSELL WHEEL & FOUNDRY CO., Chene and Belt Line R. R.; masonry, to M. BURKHEISER, 660 Ellery St.; steam heating and plumbing let to HARRIGAN & REID, 70 State St.

***Grand Rapids, Mich.**—Bids will be received by James Knox Taylor, Supervising Arch., Treasury Dept., Washington, D. C., until Sept. 14 (extension of date from Aug. 31), for the completion of the fourth floor of the U. S. post-office and court-house at Grand Rapids.

Milwaukee, Wis.—The First National Bank has authorized D. H. Burnham & Co., Archs., Chicago, to prepare plans for the construction of 16-story bank building. The probable cost is $1,500,000.

Betts & Hosmer are receiving bids for the First Baptist Church to be erected at Beaver Dam, Wis. The building will be 54 × 74 ft., of brick and stone construction with a slate roof. The basement will contain a gymnasium, shower both, locker rooms and two classrooms, while the upper floor will contain the regular church auditorium and class rooms. The cost will be about $60,000.

✚**Milwaukee, Wis.** — Kirchhoff & Rose, Archs., Majestic Bldg., have awarded the following contracts on a banking house for Second Ward Savings Bank, at West Water, Cedar and Third Sts., to cost $100,000: General construction, FULDNER CONSTRUCTION CO., Milwaukee; heating, GRASSLER & GEZELSCHAP, Milwaukee; iron work, C. COLNIK MFG. CO., Milwaukee.

A. C. Eschweiler, Arch., Goldsmith Bldg., Milwaukee, is preparing plans for the proposed county agricultural and domestic economy school at Wauwatosa. There will be three buildings: administration, agriculture and horticulture. All will be of reinforced-concrete construction, with a steam heating plant separate. The appropriation of the County Board is $188,000.

The G. M. Barrett Co. is arranging for the construction of a 4-story addition to its dry goods house on Grand Ave., between Fourth and Fifth Sts., in the spring. John Miley is Pres. and Gen. Mgr.

Brust, Philipp & Heimerl, Archs., Camp Bldg., awarded the following contracts on the $44,000 addition to St. Mary's Sanitarium, 27th and Greenfield Aves.: General work, A. SCHMIDT & SONS, Milwaukee; heating, GRASSLER & GEZELSCHAP.

✚The Department of Public Works awarded contracts for the erecting of the first unit of the Municipal Isolation Hospital, Mitchell St. and 18th Ave., as follows: Mason, S. E. WABLIZIEWSKI, Milwaukee; carpenter, GEORGE F. M. WITTE, Milwaukee; iron work, MILWAUKEE BRIDGE CO.; composition floors, AMERICAN MONOLITH CO.

✚**Sheboygan, Wis.**—The Board of Education awarded the general contract for the construction of a new school on North Third St. and Lincoln Ave. to W. E. RIBBENS, Sheboygan, Wis.

✚**Chippewa Falls, Wis.**—The Rutledge Estate awarded the contract for the entire construction of the Hannah M. Rutledge Home for Aged Women to KINGSLEY & PAYANT, Faribault, Minn. Cost, $150,000. Contractor will sublet several divisions of the work.

Madison, Wis.—M. E. McCaffrey, Secy. Bd. of Regents of the University of Wisconsin, will receive bids until Sept. 4 for the entire construction of the athletic annex to the university gymnasium, not including the structural steel, bids for which closed Aug. 21. Plans are by Arthur H. Peabody, Univ. Arch. Cost, $155,000.

Marion, Iowa.—Bids will be received until Aug. 24 by the Board of Education for erecting an addition to the Lincoln school. Plans by Charles A. Deeman & Co., Cedar Rapids, Iowa.

Wapello, Iowa.—Bids will be received by the Board of Education until Aug. 25 for the erection of a high school. Plans have been prepared by John D. Chubbe, Arch., 816 Chicago Opera House, Chicago, Ill.

Janesville, Minn.—Bids will be received by the Building Committee of the Janesville Public Library Board until Sept. 2 for erecting a Carnegie library.

Minneapolis, Minn.—William B. Ittner, St. Louis, Mo., has been retained to prepare plans for the Central High School at Fourth Ave. South and 34th St. Cost, about $500,000.

Rices, Minn.—Bids will be received by Oliver Chirhart, Dist. Clk., until Aug. 24 for erecting a 4-room school. Plans were prepared by F. W. Kinney, Arch., 1003-4 Plymouth Bldg., Minneapolis.

Wadena, Minn.—Bids will be received by Eugene Boss, County Audr., until Aug. 28, for constructing an addition to the County court-house.

Plattsburgh, N. Dak.—Bids will be received by A. M. Warren, Secy. Bd. of Educ., until Aug. 28, for erecting a high school. William T. Towner, 320 Fifth Ave., New York, is the Arch.

✚**Omaha, Neb.**—The contract has been awarded to HOY & ELZY CO., St. Paul, Minn., for the construction of a telephone structure at 18th and Douglas St. The building will cost about $52,000.

Cody, Wyo.—Bids will be received until Aug. 29 by Fred C. Burnett, County Clk., for the construction of a county court-house. Link & Haire, Billings, Mont., are Archs.

✚**Springfield, Mo.**—The contract has been awarded to the HIRAM LLOYD CONSTRUCTION CO., of St. Louis, for the erection of the additional wing to the Fourth District Normal School building. The wing will cost $65,000 and will bring the cost of the building to $290,000. The addition will be of Missouri marble and will be finished by January, 1912.

St. Louis, Mo.—The Washington University Corporation will erect a 5-story second-class warehouse to be located at 801-809 Spruce St. and 315-25 South Eighth St. The structure, according to the permit, will cost $68,000.

Claude, Tex.—Bids will be received by J. C. Caldwell, County Treas., until Sept. 11 for $60,000 court-house improvement bonds.

✚**Cleburne, Tex.**—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded contract for the construction of a post-office at Cleburne, Tex., to JOHN BARDON, Fort Worth, Tex., at $74,450.

Houston, Tex.—The Settegast Realty Co. will erect a 4-story reinforced-concrete hotel and store building on the site fronting Fannin St., between Preston and Prairie Ave. The building will have a frontage of 150 ft. on Fannin St. and will run back 100 ft. in depth. It will cost approximately $100,000 and will require about eight months to construct. The contract was awarded to JOHN STADTLER.

Mineral Wells, Tex.—Bids were received as follows on Aug. 17 by James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., for the construction of a post-office at Mineral Wells, Tex., (a) limestone, (b) sandstone: Dieter & Wenzel Construction Co., Wichita, Kan., (a) $69,780, (b) $71,780; M. B. Whitlock Co., Denton, Tex., (a) $63,850; Newport Contracting & Engineering Co., Newport News, Va., (a) $72,493, (b) $76,493; Thames & Weber, Beaumont, Tex., (a) $69,358, (b) $69,956; John Bardon, Fort Worth, Tex., (a) $71,375, (b) same; Murphy & Craft, Mineral Wells, Tex., (a) $65,769, (b) $68,630.

✚**Hugo, Okla.**—The County Commissioners let the contract for the erection of Choctaw County's court-house and jail to DOMATHAN MOORSE, of Wilburton, Okla., his bid being $107,600.

Ft. Huachuca, Ariz.—Bids will be received by G. Gordon, Constr. Q. M., U. S. A., at an early date, for the construction of eight officers' quarters, barracks and storehouses at this post.

Olympia, Wash.—Wilder & White, New York City, were selected by the Washington State Capitol Commission to have charge of the new $5,000,000 capitol to be built on the group plan, and construction of which will be started within a short time. The Commission held a competition and 30 contestants entered.

Klamath Falls, Ore.—Plans will be prepared by I. J. Knapp, for the construction of a $300,000 hotel to be erected at Grater Lake.

Pendleton, Ore.—Bids will be received by James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., Sept. 15, for the construction, complete (including plumbing, gas piping, heating apparatus, electric conduits and wiring, and lighting fixtures), of the U. S. post-office at Pendleton, Ore. Drawings and specifications may be obtained from the Custodian of site at Pendleton, Ore., or at the office of the Superv. Arch.

Los Angeles, Cal.—A hospital will be erected by the Frances Willard Hospital Association at Washington and Figuera Sts. The building will be E-shaped with projections running out to Washington St. The structure will be of reinforced concrete with an exterior of gray stone blocks, offset with suitable trimming. The basement will contain a large dining room, class rooms and general store rooms. The second and third floors will be devoted to private rooms. Altogether there will be 108 of these rooms.

Plans have been prepared for a 4-story and basement brick hotel building to be erected on a lot in Flower St., between Eighth and Ninth Sts., by F. A. Jean. The structure will cover a space 60 × 165 ft. and it will have 98 rooms and 50 bathrooms.

Plans have been completed for the 11-story reinforced-concrete office building to be erected at the northwest corner of Hill and Fourth Sts. It will be built by the Black Fireproof Building Co. The estimated cost is $400,000 to $450,000.

San Francisco, Cal.—G. E. Tuman has been granted a permit for the erection of a 7-story brick hotel building at Sutter and Mason Sts. to cost $115,000.

✚**Los Angeles, Cal.**—The BAKER IRON WORKS was awarded the contract at $135,000 for the structural steel work for the 13-story office building to be erected at Eighth and Broadway by the Los Angeles Investment Co.

✚**Los Angeles, Cal.**—Adelman & Barnett, Blanchard Bldg., have awarded the contract to the BARBER-BRADLEY CONSTRUCTION CO., 1824 East 15th St., for the erection of a 7-story loft building, 42 × 112, on Broadway, for Mrs. Mary Isaacs. The construction will be entirely of reinforced concrete construction, and cost $60,000.

Adelman & Barnett, Blanchard Bldg., have been retained by the Black Fireproof Building Co. to prepare plans for an 11-story fireproof office building, 60 × 165 ft., to be erected at Hill and Fourth Sts. The estimated cost is $450,000.

✚Myron Hunt, Union Trust Bldg., awarded contract to E. D. TYLER, 539 South Pasadena Ave., Pasadena, for the construction of a 2-story brick residence for J. P. Wilson, at Pasadena, at $45,000.

✚Parkinson & Bergstrom, Security Bldg., has awarded the contract to FRANK E. HARTIGAN, Story Bldg., at $100,000, for the construction of a concrete garage, 70 × 160, at Tenth and Hope Sts., for the California Motor Co.

✚**Oakland, Cal.**—The Southern Pacific R. R. Co. awarded contract to JAMES STEWART & CO., at $217,000, for the construction of the brick and steel frame passenger station at 16th and Wood Sts., from the plans of Arch. Jarvis Hunt, of Chicago.

✚The same company awarded contract to J. W. CARR for the construction of a 3-story and basement brick building to be erected near the Oakland Mole, from the plans of Arch. Barlow.

San Diego, Cal.—The following bids were received by the County Supervisors for the construction of a 3-story reinforced-concrete jail: General contract: John Campbell, $46,000; Schaniel Bros., $46,500; J. T. Armstrong, $49,171; J. R. Wade, $50,712; R. P. Shields, $57,910. Iron and steel: Bailey Ornamental Iron Co., $38,000; Standard Iron Works, $55,595; California Iron Works, $64,000. Plumbing and heating: Schultheis Bros. Co., $16,500; C. H. Julian, $16,868; Johnstone Plumbing Co., $18,419; F. A. Heilbron, $18,[illegible]; Plumbing: H. D. Hubbs, $15,465.

San Francisco, Cal.—The [illegible]vic Land Co. has taken out a permit for the construction of a 2-story brick store and lodging building to cover an entire block bounded by Drum, Jackson, Oregon and Embarcadero [illegible]. Cost, $50,000.

Venice, Cal.—Sircy & G[illegible]ry, I. W. Hellman Bldg., have prepared sketches for a 6-story hotel and amusement building to be erected at Venice by George Evans and associates at a cost of $200,000. The structure will be 126 × 215 ft. and of reinforced-concrete construction.

Port Perry, Ont.—Bids will be received by R. C. Desrochers, Secy. Dept. Pub. Wks., Ottawa, Ont., until Sept. 6 for the construction of a public building at Port Perry, Ont.

Weyburn, Sask.—Bids will be received until Tuesday, Sept. [illegible], by R. C. Desrochers, Secy. Pub. Wks. Dept., Ottawa, for the construction of a public building. Plans, specifications and form of contract may be seen and forms obtained from J. E. Cyr, Supt. Pub. Bldgs., Post-office Bldg., Winnipeg, or Post-office Weyburn, or Dept. Ottawa.

Truro, N. S.—Bids will be received until Aug. 25 by L. K. Jones, Secy. Dept. of Railways and Canals, for the erection of the stone passenger station at Truro, N. S.

WATER SUPPLY—IRRIGATION.

(✚*Denotes a contract awarded.*)

Alfred, Me.—The town is considering the installation of a water-works system.

Augusta, Me.—The Mousam Water Co. has increased its capital stock from $300,000 to $400,000. The company supplies water to Kennebunk, Kennebunkport, Cape Porpoise, Wellas Beach and Agunquit.

Brookfield, Mass.—Bids will be received until Aug. 26 by the Water Commissioners for removing earth at the reservoir.

✚***Pittsfield, Mass.**—We are officially advised that bids were received on Aug. 7 by the Board of Public Works for laying water-pipe in the towns of Lenox and Washington, Mass. A. O. BULLARD, Sterling, Mass., was awarded the contract at $4,774.

Boston, Mass.—Bids will be received by the city until Aug. 25 for laying 2,300 ft. of 12-in. high-service pipe in Commercial St. Louis K. Rourke is Comr. Pub. Wks.

Preliminary work on the high pressure fire service will be begun at once. Ground will be broken in the spring. Plans call for a pumping station at Charles River Basin, and piping throughout the business district. The sum of $150,000 will be expended annually for ten years. Louis K. Rourke is Comr. Pub. Wks.

The following bids were received on Aug. 20 by the Metropolitan Water and Sewerage Commission for laying 2,840 ft. of 20-in. force main, etc.: A. M. Cusack, Boston, $4,508; M. Russo & Sons, Boston, $5,469; James L. Bryne, Boston, $5,851. Dexter Brackett is Chief Engineer.

✚**Worcester, Mass.**—The city has awarded the contract to F. A. HOUDLETTE & SON, INC., of Boston, Mass., for furnishing pipe for the line to be laid from the Metropolitan water system to the city line. Estimated cost, about $60,000.

***Shelburne Falls, Mass.**—Bids for the construction of a water-works system for the Shelburne Falls Fire District will be received by the Board of Water Commissioners of the District until noon, Aug. 30. The work to be done consists in laying about ten miles of 6, 8 and 10-in. water pipe and accessories and the construction of three small reservoirs. Plans can be seen at the office of the Commissioners or at the office of E. E. Davis, Engr., Northampton, Mass., and specifications and form of proposal can be obtained on personal request from Frank H. Oakman, Clk., Comrs., Shelburne Falls, but no plans or specifications will be mailed.

✚**New York, N. Y.**—The Chapman Valve Mfg. Co. of Indian Orchard, has been awarded the contract by the Board of Water Supply for furnishing gate valves for the Catskill Aqueduct.

✚**Geneva, N. Y.**—We are officially advised that bids were received by the Board of Public Works on Aug. 15 for the construction of a slow sand filter plant and a concrete reservoir. The slow sand filter plant will comprise the placing of pipes, gates and other appurtenances, the construction of an operating house and about 8,700 cu. yds. of earth excavation, 3,000 cu. yds. of concrete masonry, 6,300 lbs. of steel reinforcing and 2,800 cu. yds. of filter gravel and sand. The concrete reservoir will comprise about 9,000 cu. yds. of earth excavation, 2,000 cu. yds. of concrete masonry and the placing of pipes, gates, etc. The bids follow: Filter plant: LAKE SHORE CONSTRUCTION & SUPPLY CO., of Dunkirk, N. Y., $35,291 (awarded contract); James E. Bunting, $43,384; Pittsburg Construction Co., $44,210; Stobaugh Contracting Co., $45,953; Hilton & Mason, $51,931. Reservoir: LAKE SHORE CONSTRUCTION & SUPPLY CO., $18,602 (awarded contract); Hilton & Mason, $29,698; Stobaugh Contracting Co., $30,886.

James E. Bunting, $31,481; P. H. Murray, $31,918. William S. Johnson is Engr., 101 Tremont St., Boston, Mass.; C. T. Church is City Engr.

Schenectady, N. Y.—The Board of Estimate and Apportionment has approved an ordinance authorizing the construction of water mains in Nott, Bradley and Hamilton Sts.

✚**Glen Rock, Pa.**—The Borough Council has awarded contracts for cementing and enlarging reservoirs and drilling an artesian well as follows: Reservoirs, to G. A. & F. M. WAGMAN, of Dallastown, Pa., at $5,200; drilling well, to the CENTRAL CONSTRUCTION CO., of Harrisburg, Pa.

Homestead, Pa.—Bids will be received by the Council until Sept. 4 for the following work: For laying about 630 ft. of 6-in. c.-i. water pipe, and 160 ft. of 2-in. galvanized pipe, the setting of one fire plug, three 6-in. tees, one 90° bend, three 6-in. plugs, two 6-in. gate valves, building two brick gate boxes. Plans and specifications may be seen at the office of Frank Trautman, Boro. Clk.

✚**Pittsburg, Pa.**—The contract has been awarded by the H. J. Heinz Co., of Pittsburg, to the CUMMINGS STRUCTURAL CONCRETE CO., of McKees Rocks, Pa., for constructing a concrete reservoir of 800,000 gallons capacity on River Ave., at about $30,-000.

✚**Pittsburg, Pa.**—Contracts have been awarded as follows by the City Controller for furnishing and erecting material at various pumping stations, Boilers, etc., at Ross pumping station, to BABCOCK & WILCOX CO., 85 Liberty St., New York, at $16,800; water line, West Carson St. station, BOOTH & FLINN, LTD., of Pittsburg, at $7,210. No bids were received for the rising main for the Mission St. station. Bids were opened on Aug. 4.

✚**Erie, Pa.**—The contract for furnishing 1,200 tons of 6 and 12-in. pipe was awarded on Aug. 12 by the Board of Water Commissioners to the U. S. CAST IRON PIPE & FOUNDRY CO., 957 East Ferry St., Buffalo, N. Y., the lowest bidder, at $21.70 per ton and $50 per ton for special castings, f. o. b. Erie.

Philadelphia, Pa.—The Baltimore & Ohio R. R. Co. has been granted permits for the erection of water-tanks and for alterations to the pump-house, on the southwest corner of Snyder and Meadow Aves., and also for the erection of water-tank supports along the Delaware River near Snyder Ave. The combined alteration will cost $8,500. J. G. Teders is Resident Engr., Wilmington, Del.

Juniata, Pa.—Bids will be received until 8 p. m., Aug. 31, by the Borough Council for the construction of a reservoir. Estimated cost, $23,000. Harvey Linton is Engr., Altoona, Pa. W. H. Baird is Boro. Clk.

Sligo, Pa.—The borough is considering the construction of a water-works system. Estimated cost, $8,000. J. J. Neil is Boro. Clk.

Wilmington, Del.—The Board of Water Commissioners has decided to investigate the cost of installing water-driven pumps with a view to using the surplus water in the Brandywine River for pumping purposes to relieve the steam pumps.

Smithfield, Md.—The Washington County Water Co., of Hagerstown, Md., is considering the construction of a reservoir near here.

Norfolk, Va.—Bids will be received until 8 p. m., Sept. 1, by the Water Commission for additions to the water supply.

*__Colonial Beach, Va.__—Bids will be received by H. W. B. Williams, Mayor, until Oct. 11 for furnishing material and constructing water-works and a system of sanitary sewers and a sewage disposal plant. Harry Stevens is Consulting Engr., Union Trust Bldg., Washington, D. C.

Grafton, W. Va.—Riggs & Sherman, Consult. Engrs., The Naseby, Toledo, Ohio, have completed plans for water-works improvements, recommending a power station at the park to cost $49,-170, force main to West Main St. to cost $27,907 and secondary main to old pumping station to cost $15,708. Total, $92,785.

Northfolk, W. Va.—Bids will be received by the city until about Oct. 1 for the construction of a water system, including concrete tanks of 30,000 gallons capacity each, and filters for the tanks.

Newbern, N. C.—The city will receive bids until Sept. 1, addressed to F. T. Patterson, Clk., for furnishing 1,500 ft. of 6-in. standard c.-i. pipe for water main, f. o. b. Newbern.

Charlotte, N. C.—Bids will be received until Aug. 24 by the Board of Water Commissioners for furnishing about 5,500 tons of 24-in. c.-i. bell and spigot water pipe and about 60 tons of specials. Alternate bids on wood pipe for about four miles of line will be considered. Gilbert C. White is Engr., Durham, N. C.

Winston-Salem, N. C.—The city has voted $40,000 of bonds for the extension of water mains and improvement of the water plant.

Palmetto, Fla.—The city has voted $20,000 of bonds for the construction of water-works and paving. W. B. Whitehead is Mayor.

Stevenson, Ala.—The city has engaged the J. B. McCrary Co., Empire Bldg., Atlanta, Ga., to prepare plans and estimates for the construction of a water-works and electric plant.

Monroe, La.—The City Engineer is preparing plans for laying new and larger water mains throughout that portion of the city covered by the old mains. Estimated cost, about $75,000. Noted on Aug. 17.

✚**Lakeland, Ky.**—Bids were received on Aug. 8 by the Kentucky State Board of Control for Charitable Institutions, Lakeland, for constructing and erecting an elevated steel tank, from plans by J. T. Neighbors, of Lakeland. The contract has been awarded to the DES MOINES BRIDGE & IRON CO., of Des Moines, Iowa, at $8,100.

Cincinnati, Ohio.—The lowest bid received on Aug. 4 by the city for laying water mains in Edwards and Grandin Roads, Delta and Columbia Aves. and Deerfield Road was submitted by M. F. Quill, Commercial Tribune Bldg., Cincinnati, at about $12,244.

✚**Ironton, Ohio.**—The contract for furnishing 261 tons of 12-in.; 193 tons of 10-in., and 40 tons of 6-in. c.-i. pipe, bids opened on Aug. 15, will probably be awarded by the Department of Public Service to the LYNCHBURG FOUNDRY CO. at $21 per ton f. o. b. Ironton. Other bidders were: R. D. Wood & Co., $24.30; U. S. Cast Iron Pipe & Foundry Co., $22.40.

Magnolia, Ohio.—The citizens on Aug. 7 decided to install a system of water-works.

Rockport (r. f. d. from Rocky Point), **Ohio.**—Bids will be received until noon, Aug. 24, by Fred Feuchter, Clk., Bd. of Trustees of Public Affairs, Rockport, for constructing water mains in Linndale Road, Barthelman Ave., Williams Ave. and Vernon St. Plans and specifications are on file with the Clerk or at the office of the W. H. Evers Engineering Co., The Arcade, Cleveland, Ohio.

Ann Arbor, Mich.—The city has engaged Prof. S. G. Williams, Ann Arbor, to appraise the local water plant and outline a new system.

Sandusky, Mich.—The citizens have voted to issue bonds for $8,000 for the extension and completion of the water-works and electric light plant.

Battle Creek, Mich.—We are officially advised that the city desires bids for filter plant, capacity from 4,000,000 to 8,000,000 gallons per 24 hrs. Information may be had by addressing P. M. Metcalf, M. E., Battle Creek.

Muskegon, Mich.—Bids will be received by the city until Sept. 5 for water-works improvements. Riggs & Sherman are Engrs., Toledo, Ohio.

Chicago, Ill.—Bids will be received until 11 a. m., Aug. 24, by L. E. McGann, Comr. Pub. Wks., for labor and materials, etc., necessary, for constructing and erecting complete the parapet and well wall on the Edward F. Dunne Crib, located in Lake Michigan.

✚The Board of Local Improvements has awarded contracts as follows for furnishing and laying water supply pipes in the following streets: Augusta St., Butler St., Delaware Pl., West 46th St., Luella Ave., East 106th St., Pearson St., West 70th Ave., South Campbell Ave., North 40th Ave., Indiana Ave., and West 105th St., to MALACHY MURPHY, 5315 Wabash Ave.; Calhoun Ave., South Hamilton Ave., Lawrence Ave., West Madison St., South Maplewood Ave., East 95th St., to SIMON RYAN, 2927 West Congress St.; Prairie Ave. and Torrence Ave., to EDWARD CONNOR, and Grace St., to CARMINE ROBERTS. Bids were opened on Aug. 3.

✚**Kewanee, Ill.**—The Board of Local Improvements has awarded the contract to ALBRECHT BROS., of Kewanee, for trenching and laying water mains in Pine St.

Rockford, Ill.—The City Council has decided to sink an additional well at 18th Ave. and Eleventh St. to provide the southeast end with water. Estimated cost, $10,000.

San Jose, Ill.—The town is considering the installation of a water-works system estimated to cost about $9,000.

✚**Westfield, Ill.**—The contract has been awarded to the CHICAGO BRIDGE & IRON CO., 105th and Throop Sts., Chicago, by the City Council for the construction of a steel tank 115 ft. high, with a capacity of 60,000 gallons. Bids wer opened on Aug. 1. W. H. Paige, Terre Haute, Ind., is Engr.

Canton, Ill.—Bids will be received by the Fire and Water Commission until Sept. 16 for a 2,000,000-gallon pumping engine of the horizontal cross-compound surface condensing Meyer valve type and for an air compressor capable of displacing 800 cu. ft. of free air per min. C. R. Beam is City Engr.

Springfield, Ill.—Bids will be received by W. J. Spaulding, Comr. Pub. Property, until Aug. 28 for 24-in. flanged c.-i. pipe and specials, including two 16-in. and four 24-in. valves f. o. b. cars, pumping station.

Seaton, Ill.—Plans have been prepared by R. W. Bolton, of Aledo, Ill., it is reported, for the construction of a gravity system of water-works, including a supply tank with a capacity of not less than 20,000 gallons, on a steel tower 80 ft. high, the water supply to be derived from a 6-in. deep well and pump, both to have a capacity of 20 gallons per min.; watermains to cover entire business and residence district, requiring 20 blocks of mains, 5-in. mains in business section and 4 and 3-in. mains in residence sections and double hydrants at every block.

✚**Pana, Ill.**—The contract for the new water-works system here has been awarded to O. T. DUNLAP, of Edwardsville, Ill.; McGOWAN & CO., of Cincinnati, Ohio, and the PLATT IRON WORKS, of Dayton, Ohio. Total cost, $51,200.

Elroy, Wis.—Bids will be received until Aug. 29 by the City Clerk for erecting an elevated steel tank of 25,-000 gallons capacity and laying about 1,500 ft. of 4 and 6-in. c.-i. pipe. C. B. Stewart is Consult. Engr., Madison, Wis.

West Milwaukee, Wis.—The Village Board will receive bids until Sept. 5 for furnishing and laying 5,000 lin. ft. of 8-in. c.-i. water pipe, setting stop gates, hydrants and all other appurtenances. S. Brew is Village Clk.; G. A. Geiger, 12 Mack Block, Milwaukee, is Engr.

Sparta, Wis.—C. H. Gregory, Secy., Water Comn., will receive bids until 2 p. m., Sept. 2, for laying 180 ft. of 10-in., 1,670 ft. of 8-in., 796 ft. of 6-in. and 2,100 ft. of 4-in. pipe and five hydrants.

✚**Arthur, Iowa.**—The contract for the construction of the water-works system here has been awarded to the LOVELL CONSTRUCTION CO., of Minneapolis, Minn., at $9,450.

Council Bluffs, Iowa.—Bids will be received by the Board of Water Works Trustees until Sept. 7 for an 8,000,000-gallon Corliss cross-compound pumping engine. Burns & McDonnell, Scarritt Bldg., Kansas City, Mo., are Engrs. S. L. Etnyre is Supt. W.-Wks.

✚**Lester, Iowa.**—The contract has been awarded to C. W. HOLLAND & CO., of Des Moines, Iowa., for installing a system of water-works at $5,-965.

Lost Nation, Iowa.—We are officially advised that The Iowa Engineering Co., Charles P. Chase, Mgr., has been engaged to prepare plans and specifications for the construction of a water-works system here. Estimated cost, $12,000.

Decorah, Iowa.—Bids will be received by F. M. Hughes, City Clk., until Sept. 6 for the extension of water mains.

*__Fairfield, Iowa.__—Bids will be received by C. E. Ward, Chmn. Water Com., until 7 p. m., Sept. 25, for a gravity filtration plant, the plant to consist of building, filter tanks, coagulation tanks, settling tanks, pumps, blower, washing devices, pipe fittings, etc. Size of plant to be sufficient for treatment of 1,000,000 gallons per 24 hrs.

✚**Boone, Iowa.**—The City Council has awarded the contract to ZITTRELL & SULLIVAN, of Webster City, Iowa, for constructing two large reservoirs.

✚**Duluth, Minn.**—S. JOHNSON and ERICK NORDQUIST & CO., who submitted a joint bid on Aug. 17 to the city, have been awarded the contract for the west end hillside water-main extension by the Board of Water and Light Commissioners at $15,283. Other bids were: Charles Eklund, $15,977; George R. King, $16,169; Pastoret Lawrence Co., $16,776; E. Engle, $17,316; Fairbanks, Morse & Co., $18,781; C. S. Prosser & Co., $19,684.

✚**Minneapolis, Minn.**—The Water Committee has awarded contract for 6,500 ft. of 60-in. water pipe, it is reported, to the U. S. CAST-IRON PIPE & FOUNDRY CO., Rookery Bldg., Chicago, Ill., at $25 per ton. The pipe will be used for the water main from the pumping station to Central Ave.

Burden, Kan.—Bids will be received until 7 p. m., Sept. 5, by the town for the installation of a water-works system including c.-i. pipe, hydrants, valves, 50,000-gallon tank, gasoline pumping equipment, etc. Rollins & Westover are Engrs., Beals Bldg., Kansas City, Mo.

✚**Burlington, Kan.**—We are officially advised that all bids for water-works extensions were rejected by the city on Aug. 11. The lowest bid received was $11,500. On Aug. 14, J. W. VASEY submitted a bid of $9,843 and was awarded the contract.

Chapman, Kan.—Burns & McDonnell, Consult. Engrs., Scarritt Bldg., Kansas City, Mo., are preparing plans for the construction of a system of water-works. Estimated cost, $20,000.

Mound City, Kan.—Bids will soon be asked by T. T. Thorne, City Clk., for improvements to the water-works system. Estimated cost, $25,000. The J. S. Worley Co. is Engr., Reliance Bldg., Kansas City, Mo.

Pittsburg, Kan.—The citizens on Aug. 1 voted in favor of issuing bonds for $225,000 for the purchase of the plant of the Pittsburg Water Supply Co. and $40,000 for proposed improvements.

✚**Anselmo, Neb.**—The contract for constructing water-works here has been awarded by the city to C. G. EMPFIELD, of Anselmo, at $7,450.

Omaha, Neb.—Bids will be received until Sept. 6 by the Water Board for the construction of a 14-in. water-main from 40th and California Sts. to 48th and California Sts., for the supply of Dundee. Estimated cost, about $8,000.

Crawford, Neb.—Clyde Hornby, City Clk., will receive bids until 4 p. m., Sept. 2, for 34,000 ft. of wood stave water pipe and 2,000 lbs. of c.-i. fittings, etc.

Aberdeen, S. Dak.—The City Commission has authorized R. B. Easton, City Engr., to prepare plans for the erection of a stand pipe of 500,000 or 600,000 gallons capacity.

Rapid City, S. Dak.—The city is considering the installation of a water-works system. Estimated cost, $100,-000.

Sioux Falls, S. Dak.—Bids will be received about Sept. 15 for sinking a new well. Estimated cost, $12,000. S. B. Howe is City Engr.

Grand Forks, N. Dak.—Bids will be received by H. G. Lykken, City Engr., until Sept. 15 for a vertical, compound, outside packed, double-acting steam pump of 1,500,000 gallons capacity.

Hannibal, Mo.—The city has purchased the water-works plant of the Hannibal Water Co. at $275,000. Noted on Aug. 17.

Kansas City, Mo.—Bids will be received until 2 p. m., Aug. 30, by the Purchasing Agent, Kansas City, for the erection of an intake pier house, structural steel work and an electric traveling crane at the Quindaro, Kan., station of the Water Works Department. Plans are on file at the office of E. B. Harrington, Secy. Bd. Fire and Water Comrs.

St. Charles, Mo.—The City Council has rejected all bids opened for the proposed water-works improvements as excessive. New bids will be asked for two reservoirs and a pipe line. Estimated cost, $30,000.

Kansas City, Mo.—Burns & McDonnell, Consult. Engrs., Scarritt Bldg., Kansas City, Mo., are preparing plans for the construction of a system of water-works for the Jackson County farm. Leo M. Gilday is County Clk.

Alpine, Tex.—A large system of irrigation is to be installed near here by H. J. Gray, of Alpine, and associates. A reinforced-concrete dam will be built to impound sufficient water to irrigate 23,000 acres of land. A town will be laid out upon the property which the syndicate has purchased.

Dallas, Tex.—Plans have been approved and the City Secretary instructed to advertise for bids for the erection of a reinforced-concrete dam across the Trinity River at California Crossing. Estimated cost, about $20,-000. J. M. Preston is City Engr.

Luling, Tex.—G. S. Combs, of San Antonio, Tex., and associates, will install an irrigation system upon a tract of 1,200 acres of land that they have bought near here. A pumping plant will be installed and a water supply obtained from the San Marcos River.

San Marcos, Tex.—The San Marcos Utilities Co. will extend its water-works system into Katyville, a suburb of this place. The laying of 3,500 ft. of water mains will be required.

Smithville, Tex.—The Smithville Light, Power & Water Co. will sink two 10-in. artesian wells to supply the town.

Fort Stockton, Tex.—We are officially advised that T. W. Mavity, Lyndon, Kan., has made surveys and plans and specifications for an irrigation project on the Pecos River, Pecos County, Tex.

Bennington, Okla.—The town has voted $20,000 of bonds for the construction of a water-works system.

✚**Hollis, Okla.**—The city has awarded the contract to KENNEDY & FLEMING, of Oklahoma City, Okla., for the construction of the water system.

Wainwright, Okla.—The town has voted $20,000 of bonds for the construction of a water-works system.

✚**Waynoka, Okla.**—Bids have been received as follows by the city for the construction of a water and electric light system: N. S. Sherman Machine & Iron Works, $23,977; Kennedy & Fleming, $24,006; OKLAHOMA ENGINEERING CO., Anadarka, Okla., $24,-475 (awarded contract); Fletcher & Hultz, $27,781.

Olathe, Colo.—The Town Board on Aug. 10 awarded the contract to BARNES & STEPHENS, of Colorado Springs, Colo., for the construction of the water system at about $59,300.

Las Cruces, N. Mex.—Bonds for $75,-000 have been sold for the construction of water-works and a sewer system.

✚**Las Cruces, N. Mex.**—The Secretary of the Interior has awarded the contract to the LIDGERWOOD MFG. CO., 96 Liberty St., New York, for furnishing three cableways for use in the construction of Eagle Dam, Rio Grande Irrigation Project, N. Mex. These cableways each have a span of 1,420 ft. They are to be operated automatically, each cableway adapted to operate a 3-yd. Type B, Andresen-Evans grab bucket or its equivalent, representing an average load of ten to eleven tons when filled with sand, or an average load of concrete of eight tons, operating with aerial dumping device. The bid of the Lidgerwood Mfg. Co. was $47,400.

Carlsbad, N. Mex.—The Carlsbad Public Utilities Co. has adopted plans for the construction of an addition to its reinforced-concrete dam near here at a cost of about $8,000. A. J. Muzzy, of Bristol, Conn., is Pres.

✚**Newton, Utah.**—The contract has been awarded to the WHEELWRIGHT CONSTRUCTION CO., of Ogden, Utah, for constructing the water-works system at about $20,000.

Thistle, Utah.—Bids were opened on Aug. 7 by the U. S. Reclamation Service, Provo, for the construction of the diversion canal, about five miles of canal, located about 15 miles northeast of Thistle. The work involves the excavation and placing of approximately 145,000 cu. yds. of material. The bids follow: Maney Bros. & Co., Boise, Idaho, $34,510; N. Straw & Co., Springville, Utah, $43,310; Ely Construction Co., Springville, $26,460; W. O. Morrison, Denver, Colo., $32,845.

Asotin, Wash.—The Council is considering issuing bonds for $35,000 for the installation of a water system. E. Mathas is Town Clk.

Elma, Wash.—The Council is considering water main extension.

Tenino, Wash.—The Council has granted a franchise to the Tenino Light, Power & Water Co. to erect and maintain and operate a system of water-works here.

Toppenish, Wash.—The Council is considering extending the watermains.

✚**Portland, Ore.**—The city has awarded contracts as follows for furnishing and delivering water pipe and specials: To the U. S. CAST IRON PIPE & FOUNDRY CO., Rookery Bldg., Chicago, Ill., for 2,000 tons of 8-in. pipe at $32.25 per ton, or $64,500; to the OREGON IRON & STEEL CO., Oswego, Ore., for 497 tons of 12-in. pipe at $32 or $15,904, and 940 tons of 8-in. pipe at $32 or $30,800; and 163 tons of 6-in. pipe at $33 or $5,379.

Woodville, Ore.—Plans have been prepared for the installation of a water system here, including both pressure tank and reservoir system, 6-in. pipe to be used from reservoir to foot of hill, about 2,000 ft., and 4-in. pipe through the town.

✚**Los Angeles, Cal.**—The contract has been awarded to J. L. ACKLAND, 818 Kingsley Drive, Los Angeles, for the construction of a 500,000-gallon reinforced-concrete water reservoir, on Los Angeles Mesa tract for the Mesa Land Co., Forrester Bldg., Los Angeles.

San Francisco, Cal.—The Board of Public Works has awarded the contract for constructing a division wall of concrete in the Twin Peaks reservoid to the HEALY-TIBBITTS CONSTRUCTION CO., Main and Market Sts., San Francisco, at $19,500. This reservoir is for the auxiliary fire protection system.

✚The Board of Public Works has awarded the contract to F. C. ROBERTS, of San Francisco, for the construction of a 500,000-gallon steel tank to connect with the Twin Peaks reservoirs at $12,350. Noted on Aug. 10.

✚**Oakdale, Cal.**—The contract has been awarded to the SACRAMENTO PIPE WORKS for furnishing about 45,000 ft. 24 to 12-in. pipe for the water system here.

Sawtelle, Cal.—Bids will be received until Sept. 7 for furnishing and installing a water softening plant at the National Soldiers Home at Sawtelle. E. W. Moore is Treas.

***Windsor, Ont.**—Bids for an intake pipe and screen well for the city, addressed to W. A. Hanrahan, Second Water Comn., will be received at the office of the Water Commissioners until Sept. 12. Copies of plans and specifications are on file at the Water Office, Windsor, and also at the office of Smith, Hinchman & Crylls, Detroit, Mich.

Winnipeg, Man.—Bids will be received until 11 a. m., Sept. 5, by M. Peterson, Secy. Bd. Control, for supplying a quantity of c.-i. water pipe delivered f. o. b. city yards, Winnipeg.

SEWERAGE.

(**Denotes that this work is advertised in Engineering News.*)

New Bedford, Mass.—Bids will be received until Sept. 6 by the city for laying about 3,300 ft. of 60-in. pipe in Buzzards Bay for the outfall of the intercepting sewer system. Plans, specifications and form of proposal may be secured upon application to William F. Williams, City Engr.

✚**Wrentham, Mass.**—We are officially advised that the contract has been awarded to MORRELL & DIPPOLITO, North Attleboro, Mass., for the construction of sewers, etc., for the State School here, at $7,943. Bids were opened on Aug. 21. William S. Johnson is Engr., 101 Tremont St., Boston, Mass.

✚**Boston Mass.**—The contract for pipe drains in Champney St., Brighton, has been awarded to GEORGE J. REGAN. Louis K. Rourke is Comr. Pub. Wks.

✚The contract for sewerage works in Byron St. has been awarded to DANIEL E. LYNCH. Louis K. Rourke is Comr. Pub. Wks.

Boston, Mass.—Bids will be received until Aug. 25 by the Department of Public Works for the construction of catch basins in Roxbury and Dorchester, and for constructing pipe sewers and drains in Freeport and Conley Sts., Dorchester. Louis K. Rourke is Comr. Pub. Wks.

Fitchburg, Mass.—We are officially advised that bids were received by the Board of Sewage Disposal Commissioners, 352 Main St., on Aug. 15, for the construction of Section 2 and Section 2A of the main intercepting sewer. The bids follow: Section 2: C. E. Trumball Co., Boston, Mass., $46,709. A. G. Tomasello, Dorchester, Mass., $53,841; Little & Seretto, Leominster, Mass., $54,504; George W. Carr, Worcester, Mass., $58,518; John J. Falvey, Somerville, Mass., $61,352; James D. Kelly, Dorchester, $62,112; Coleman Bros., Boston, $70,557. Section 2A: Little & Seretto, $57,073; James D. Kelly, $58,695; A. G. Tomasello, $67,402; Coleman Bros., $91,595.

✚**Torrington, Conn.**—The contract for the completion of the McKinley St. outfall sewer and sewers in Wall and Millard Sts. has been awarded to H. S. DRISCOLL & CO., at $5,750. The items were 1,189 ft. of 18-in., 790 ft. of 10-in., 1,253 ft. of 8-in. vitrified tile pipe, 138 ft. of 18-in. c.-i. pipe and relaying 134 sq. yds. of paving.

Wallingford, Conn.—Bids will be received until Sept. 5 by the Court of Burgesses for the construction of a sewer in Randolph St. and Hall Ave.

Dunkirk, N. Y.—J. M. Hackett, City Engr., has prepared plans and specifications for the construction of about one mile of new sewers. Estimated cost, $20,000.

Hobart, N. Y.—O. A. Miller, Engr., Oneonta, N. Y., is completing plans and specifications for the construction of a sewer system here. Estimated cost, $25,000.

Newburgh, N. Y.—The City Clerk will receive bids until Sept. 5 for constructing a tile pipe sewer along the course of the open ditch on the south side of Washington Heights and on the north side of the Erie R. R. tracks for a distance of about 1,400 ft. to connect with the drain at a point near the north entrance to the West Shore tunnel.

New York, N. Y.—Bids will be received by Alfred E. Steers, Pres. Boro. Brooklyn, until 11 a. m., Aug. 30, for furnishing all the labor and material required for constructing a sewer in Lincoln Ave., between Ridgewood Ave. and Jamaica Ave., and a temporary outlet across what was formerly Condit St.

✚**New Rochelle, N. Y.**—The contract for the construction of sewers in North Ave., from Eastchester Road to Broadview, has been awarded to ROCHELLE CONSTRUCTION CO., of New Rochelle, N. Y.

Hightstown, N. J.—Plans have been approved by the State Board of Health for the installation of a sewer system. Estimated cost, $35,000.

✚**Paterson, N. J.**—The contracts for the construction of the West Paterson Totowa sewer were awarded by the Board of Public Works on Aug. 14 as follows: Section B, McKIERNAN & BERGIN, $14,082; Section C, part 1, FRANK PUGLIA, $2,649; Section C, part 2, UNION BUILDING & CONSTRUCTION CO., $6,473; Section D, FRANK PUGLIA, $4,067; Section E, UNION BUILDING & CONSTRUCTION CO., $25,000; Section F, UNION BUILDING & CONSTRUCTION CO., $20,860; Section G, UNION BUILDING & CONSTRUCTION CO., $7,978.

Altoona, Pa.—Bids will be received until 3 p. m., Aug. 25, by the Board of Public Works, for the construction of a 12-in. vitrified clay pipe sewer in Eleventh Ave., between Eleventh St. and Twelfth St. W. M. C. Craine is Pres. Bd.

✚**West Pittston, Pa.**—The contract has been awarded to McCONVILLE & FITZPATRICK, of Pittston, at $6,398, for repair work on the sewage system. The repair work will include the sewers on York Ave., Montgomery St., Exeter St., Susquehanna Ave., Warren St. and a small portion on Luzerne Ave. outlet.

✚**Philadelphia, Pa.**—We are officially advised that contracts for sewer construction, bids opened on Aug. 15, have been awarded by the city as follows: Rock Run sewer in Fisher Ave., to PATRICK DURKIN, 2950 North Seventh St., Philadelphia, at $23,000; Dobson's Run storm water and sewage sewer, to JOSEPH PERNN, 334 North 65th St., Philadelphia, at $31,000; Cobbs Creek intercepting sewer, Florence to Thomas Aves., to RYAN & REILLY, 1438 South Penn Sq., Philadelphia, at $23,000; 57th St. sewer, Jefferson to Susquehanna, to J. JOSEPH McHUGH, 68th St. and Baltimore Ave., Philadelphia, at $20,000.

***Colonial Beach, Va.**—See item under Water Supply—Irrigation.

Rock Hill, S. C.—Bids will be received until noon, Sept. 15, by the Sewerage Commission for the construction of three sewage disposal plants, consisting of Imhoff tanks, sprinkler filters, contact beds and sludge beds, in accordance with plans on file in office of Thomas W. Cothran, Engr., Rock Hill. J. B. Johnson is Chn. Comrs.

Paducah, Ky.—Bids will be received by the Board of Public Works until 10 a. m., Sept. 5, for 1,146 ft. of c.-i. drain pipe. L. A. Washington is City Engr.

Louisville, Ky.—We are officially advised that bids were received by the Commissioners of Sewerage, P. L. Atherton, Chn., on Aug. 18, for constructing the Alta Ave. sewer, Contract No. 84. The work consists of 4,220 ft. of 10-in. sewer and 24-in. to 45-in. storm water drain, and 4,220 ft. of 10-in. pipe. The bids follow: Henry Bickel Co., Louisville, $29,340; C. T. McCracken & Co., $3,143; James Ferry & Sons, Pittsburgh, Pa., $34,710; B. C. Milner & Sons Co., Louisville, $48,853.

***Bucyrus, Ohio.**—Bids will be received until noon, Aug. 30, by Adam Ulmer, Dir. Pub. Ser., for the construction of storm water sewers in South Sandusky Ave. and Southern Ave. The following are the approximate quantities: 750 ft. 18-in. pipe, 520 ft. 30-in. pipe, 500 ft. 36-in. pipe, 455 ft. 42-in. pipe, 4,850 ft. 48-in. pipe and 20 manholes.

✚**Cincinnati, Ohio.**—The contract has been awarded to THOMAS P. STRACK, at $5,383, by the Board of Control for sewering Waverly Ave.

✚**Columbus, O.**—Bids were received by H. S. Holton, Dir. Pub. Ser., on Aug. 15 for the labor and materials necessary to construct a sewer in Milo, a suburb of Columbus. The contract has been awarded to JOHN C. BEASLEY, Columbus, Ohio. Noted on Aug. 3.

Delaware, Ohio.—The City Council has adopted a resolution to proceed with construction of a sanitary sewer in Delaware.

Brazil, Ind.—Plans are being prepared on which bids will be received for the construction of a sanitary sewer system on the west side. Frank Kattman is City Engr.

Galveston, Ind.—The Town Council will receive bids until Sept. 6 for the construction of two sanitary sewer systems. Eugene Masters is City Clk.

Kokomo, Ind.—The Board of Public Works are asking for bids until Aug. 28 for the construction of a vitrified tile sanitary sewer in Mulberry St. east to Morris sewer. The Board is likewise planning to ask bids for the construction of a vitrified tile sewer in first alley west of Lafontain St. and in Broadway to the Harmon sewer. Ben Havens is City Clk.

Indianapolis, Ind.—See item under Garbage Disposal.

Indianapolis, Ind.—The Board of Public Works has ordered plans and specifications on which bids will be asked for the construction of a sewer in Dearborn St. and a sewer in first alley east of Capital Ave., from Norwood to McCarty Sts.

Peru, Ind.—Bids will be received by the Board of Commissioners of Miami County until Sept. 2 for one-half mile of 6, 8 and 12-in. drain tile for the Hamer & Hamilton ditch. F. McElheny is County Audr. E. B. Lockbridge is County Engr.

South Bend, Ind.—Bids will be received by the Department of Public Works until 10 a. m., Aug. 29, for the construction of two lateral and two pipe sewers. A. P. Perley is Clk.

Milan, Mich.—Bids will be received by the Village Council until Aug. 30 for the construction of lateral sewers.

Bushnell, Ill.—Bids will be received by the City Clerk until 7.30 p. m., Sept. 4, for constructing about five blocks of sewers.

Carlyle, Ill.—The City Council is considering the construction of a sewer. Estimated cost, $19,000.

✚**North Chicago, Ill.**—The contract has been awarded to WILLIAM MORAN & CO., Waukegan, for the construction of the North Chicago sewer system. Bids were submitted as follows: William Davidson, Wilmette, $48,657; Dearborn & Jackson, Cedar Rapids, Ia., $48,216; N. F. Reichert, Racine, Wis., $47,744; Thomas J. Killian, North Chicago, $46,916; William Moran & Co., Joliet, Ill., $45,510.

Palmyra, Ill.—The City Council has passed an ordinance for the construction of a sewer line that will give a large part of the east side of Palmyra south of Water St. sewer connections.

Quincy, Ill.—The City Council has passed ordinances for the construction of sewers in various parts of Quincy. Work will be done in the following streets: To construct a pipe sewer on Payson Ave., from Third St. to a point 30 ft. west of the west line of Twelfth St.; to construct a pipe sewer in Spring St., between 17th St. and a point 33 ft. east of the east line of 14th St.; to construct pipe sewers in Oak St., from a point three feet east of the west line of 17th St. to a point 550 ft. of the east line of 22d St. The Engineer's estimated cost of these three sewer jobs is around $16,300.

✚**Waukegan, Ill.**—The contract has been awarded to LANYOUN & CLIFFORD, Waukegan, at $74,000, for the construction of a sewer system in Arlington Heights.

Bethany, Ill.—Bids will be received by the Village Clerk until noon, Aug. 28, for constructing 550 rods of tile drain. Loring & Ferris are Engrs.

✚***Neligh, Neb.**—Bids were received on Aug. 5 by the city for constructing a sanitary sewer and an outlet main. The contract has been awarded to GUY E. SMITH, of Indianola, Iowa, at $7,353.

Mitchell, S. Dak.—Bids will be received by N. H. Jensen, City Audr., until 8 p. m., Sept. 4, for the construction of lateral sewers.

St. Louis, Mo.—A petition has been granted by the Board of Local Improvements for a sewer in East Lansdowne. The work will cost $250,000. A. Harper is City Engr.

St. Louis, Mo.—Bids will be received by the Board of Public Improvements until noon, Aug. 25, for the construction of the Clifton Heights Joint District Sewer. William T. Findly is Secy.

St. Louis, Mo.—Bids were received by the Board of Public Improvements on Aug. 18 for reconstructing the Ferry St. sewer and constructing a branch sewer. The contract was awarded to the FRUIN-COLNON CONTRACTING CO., Laclede Bldg., St. Louis, Mo., at $29,872. Other bidders were: Geisel Construction Co., $35,269; John P. McMahon, $35,271; American Contracting Co., $34,450; Ruhlin-Bambrick Construction Co., $[illegible],770; Wm. F. Riley Construction Co., $33,225; Hoffman-Hogan Construction Co., $31,862.

Prescott, Ark.—Bids will be received by M. W. Gresson, Secy. Commrs., Sewer Improvement District No. [illegible], until Sept. 6 for 25,500 cu. yds. of excavation, 45,000 lin. ft. of sewer pipe, [illegible] manholes and a sewer treating bed. James W. Beebe, of Prescott, is Engr.

✚**Dallas, Tex.**—The City Commission has awarded the contract for the construction of a storm sewer through Winnetka Heights to JOS. B. WINSLETT, Jr., at $9,466.

The City Engineer of Dallas has been instructed to prepare plans and advertise for bids for putting in a storm sewer in Live Oak St. between Haskell Ave. and Peak St.

Mt. Pleasant, Tex.—We are advised that Mobberly & Burton, Woodruff Bldg., Springfield, Mo., Engrs., have received bids for a sewer system estimated at $16,000, to be installed in Mt. Pleasant, Tex. All bids were rejected. No date has been set for new bids.

Kennewick, Wash.—The city of Kennewick contemplates the installation of a $75,000 sewer system and the laying of about 150,000 sq. ft. of sidewalks in the near future.

Vancouver, Wash.—Bonds for a $50,000 trunk sewer for the city of Vancouver, were voted on Aug. 1. Bids for the construction of same will be asked shortly. H. H. Lotter is City Engr.

Coronado, Cal.—The lowest bid received for constructing a sewer system in Coronado was that of R. W. Nikcevich, Los Angeles, at $28,000.

Santa Ana, Cal.—Plans have been prepared for the construction of sewers in separate sewer districts. Edward Tedford is City Clk.

***Toronto, Ont.**—Bids for the construction of the following sewers will be received addressed to G. R. Geary, Mayor and Chn. Bd. of Control, until noon, Sept. 12: Storm overflow sewer, Sorauren Division, total length, 8,397 lin. ft., including the laying of 30 and 36-in. concrete pipe and the supplying and laying of 24-in. c.-i. pipe, and 15, 18 and 24-in. vitrified pipe. Storm overflow sewer, Manchester division, 906 lin. ft. of 3 ft. 4 in. × 3 ft. 8 in. concrete culvert, in open cut. High level interceptor, section No. 14, 955 lin. ft. of 3 ft. × 4 ft. 6 in. egg-shape brick, in tunnel. Plans, specifications, forms of proposal and conditions relating to bidding may be obtained from the Main Drainage Works, office of C. H. Rust, City Engr.

GARBAGE DISPOSAL.

(✚*Denotes a contract awarded.*)

New York, N. Y.—Bids will be received by W. H. Edwards, Comr. of St. Cleaning, until noon, Sept. 7, for furnishing all the labor and materials required for the removal of snow and ice during the winter season of 1911-1912, in the Boroughs of Brooklyn, The Bronx and Manhattan. The time for the completion of the work and the full performance of the contract is by or before April 15, 1912.

Indianapolis, Ind.—Harry Klausman, City Engr., has been instructed to prepare plans for the construction and installation of a city garbage and sewage reducing plant. Estimated cost, about $100,000.

✚**Virginia, Minn.**—The contract for constructing the garbage incinerator of 25 tons capacity has been awarded to the DE CARIE INCINERATOR CO., of Minneapolis, Minn., at $23,700. Bids were opened on Aug. 1.

✚**Muskogee, Okla.**—The contract has been awarded to LEWIS & KITCHEN, of Kansas City, Mo., it is reported, for the installation of the garbage plant.

STREETS AND ROADS.

(**Denotes that this work is advertised in Engineering News.*)

✚**Portland, Me.**—The contract for constructing 2,400 ft. of road on Cleveland Ave. has been awarded to SHAWMUT CONTRACTING CO., at $13,214. Other bids were John W. Gulliver, $13,590; Forgione & Romano, $15,000; Hassam Paving Co., $16,562; F. W. Cunningham & Son, $18,794.

Boston, Mass.—Bids will be received by Department of Public Works until Aug. 30 for edgestones, gutters, crosswalks and artificial stone sidewalks in Bradshaw, Charlotte and Glenway Sts., Dorchester. Louis K. Rourke is Comr. Pub. Wks.

Bids will be received by Department of Public Grounds until Sept. 1 for soil work, renovation and grading on Boston Common. D. Henry Sullivan is Supt. Pub. Grounds Dept.

✚The contract for the construction of granolithic walks and gutters at the Charles River Dam was awarded by the Metropolitan Park Commission to the LOWE ANNINGTON CO., Brookline, at $6,481. Other bids were: Porter V. Pearl, Boston, $6,498; Jas. H. Fannin, Somerville, $7,125; Warren Bros. Co., Boston, $7,353; Jeremiah J. Sullivan, Boston, $8,208; Simpson Bros. Corpn., Boston, $8,311; Wm. R. Murtfeldt Co., Boston, $9,177; John R. Rablin is Chief Engr. Comn.

Bids will be received by Department of Public Works until Aug. 29 for constructing asphalt pavement on Pop-

lar and Leverett Sts. Louis K. Rourke is Comr. of Pub. Wks.

It is proposed to extend Arlington St. to the Charles River Basin at an estimated cost of $150,000. Louis K. Rourke is Cmr. of Pub. Wks.

✚The contract for paving with wood blocks, Washington St., between Williams and Dudley Sts., has been awarded to JAMES DOHERTY at $16,499. Other bids were: F. H. Cowin Co., $15,553 (not strictly according to proposal); F. S. & A. D. Gore Corporation, $17,037; Coleman Bros., $17,476; Central Construction Co., $17,793; Coughlin & Shiels Co., $18,484. Louis K. Rourke is Comr. of Pub. Wks. Noted July 27.

✚The contract for 13,700 ft. of macadam road in Plymouth has been awarded by the State Highway Commission to CORCHIA BROS. CONSTRUCTION CO., Boston, at $11,526. Other bids were: R. F. Hudson, Wilmington, $11,672; F. J. Magee, W. Newton, $11,985; H. L. Thomas, Middleboro, $12,692; F. J. Quinn, Ashton, R. I., $12,717; Morrell & De Polito, North Attleboro, $12,818 (informal); A. W. Brine Co., Hartford, Conn., $13,730; D. Di Pietro, Boston, $14,018; Lane Quarry Co., Hingham, $16,409. Harold Parker is Chn. of Comn.

Derby, Conn.—We are officially advised that bids will be received by James S. Donahue, City Clk., until 6 p. m., Aug. 25, for constructing about 3,750 sq. yds. of bituminous macadam pavement.

✚**Hartford, Conn.**—Contracts for State Road work, bids for which were received at the office of the State Highway Commissioner on Aug. 10, have been awarded as follows:

Town of Washington, 1,707 lin. ft. macadam-telford, heavy grading, on the New Milford Road, to the B. D. PIERCE, JR., CO., Bridgeport, at $2.27 per lin. ft. for macadam, $3.07 for telford, $1 for rubble drain.

Town of Stamford, 1,840 lin. ft. macadam-telford, heavy grading, on Bedford Road, to L. F. MERRITT, Stamford, $2.84 for macadam, $4.50 for telford, $1.25 for rubble drain.

Town of Windham, 3,449 lin. ft. macadam-telford on Columbia Ave., medium grading, to A. VITO & CO., Thompson, $1.55 for macadam, $2.45 for telford, $1 for rubble drain.

Town of Windsor, 6,007 lin. ft. macadam-telford on the Springfield Road, to the PIERSON ENGINEERING & CONSTRUCTION CO., Bristol, $2.17 for macadam and 80 cts. per lin. ft. extra for rubble drain.

Town of Granby, 7,606 lin. ft. macadam-telford on the Simsbury Road, to A. VITO CO., Thompson, $1.58 for macadam, $2.75 for telford, $1.25 for rubble drain, $14 per cu. yd. for concrete abutments, $8 per cu. yd. for masonry abutments, $6.50 per cu. yd. for walls.

Town of Cornwall, 6,215 lin. ft. graded road on the Bunker Hill Turnpike, to B. N. BEARD CO., Shelton, $7,200 for the grading and 75 cts. per lin. ft. extra for telford, $1 for rubble drain, 50 cts. for cobble gutters per sq. yd. and $5 per cu. yd. for walls.

Town of Beacon Falls, 1,100 lin. ft. grading on the River Road, to JOHN DE MICHIEL & BRO., Torrington, at $1,050 for the grading and 60 cts. per lin. ft. extra for telford, $1 for rubble drain.

Town of Windham, 8,515 lin. ft. gravel-telford on the Norwich Turnpike, to B. N. BEARD CO., Shelton, 98 cts. per lin. ft. for gravel, 80 cts. per ft. extra for telford, $1 per lin. ft. for rubble drain.

Town of Watertown, all bids rejected and will be readvertised. Noted Aug. 17.

Hartford, Conn.—Plans for proposed state road work have been received by the State Highway Commissioner as follows: From E. C. Welden, Div. Engr., 23,800 lin. ft. on the River Road from Stafford to Willimantic, in the Town of Mansfield; 3,000 lin. ft. on Windsor Ave., City of Rockville. From S. H. McKenzie, Engr., about 1½ miles on the Center Road in the Town of Wolcott.

Naugatuck, Conn.—Bids will be received by the City until 6 p. m., Aug. 25, for constructing 3,750 sq. yds. of bituminous asphalt pavement on Derby Ave. Plans and specifications are on file at the office of the City Clerk. James A. Miles is Mayor.

***Stamford, Conn.**—Bids will be received by the City Clerk until 8 p. m., Sept. 5, for paving a portion of Elm St. Plans are on file at the office of the City Clerk. The proposed work consists of about 6,500 sq. yds. of brick pavement.

✚**Larchmont, N. Y.**—The contract for laying about 25,000 ft. of cement sidewalks has been awarded to DALY & MERRITT, Port Chester, at $20,000. Noted on July 27.

***Huntington, N. Y.**—Bids will be received by the Town Board until 11 a. m., Sept. 8, for improving Main St., from New York Ave. to Green St. Plans are on file at the office of Alonzo P. Whitson, Town Supt. of Highways.

New York, N. Y.—Bids for improving Albany Road, from 230th to 235th sts, were received on Aug. 8 by the President of Borough of Bronx as follows: Lamura Construction Co., $22,619; H. J. Byrne, $30,625; Watson Contracting Co., $25,333; Reilly & Breen, $31,144, and C. W. McDonald, $35,165; for paving Exterior St., Asphalt Construction Co., $32,087; F. Petelli, $36,108; Burnside Contracting Co., $33,305; M. Baird Contracting Co., $33,626; Atlanta Contracting Co., $34,887; for improving City Island Ave., T. M. Hart, $49,580; Uvalde Contracting Co., $59,627, and Standard Bitulithic Co., $69,605.

Bids will be received by the Park Board, Dept. Parks, Arsenal Bldg., Fifth Ave. and 64th St., Boro. of Manhattan, until 3 p. m., Aug. 31, for furnishing and delivering road oil for reconstructing the roadway of the Bronx and Pelham Parkway, from the Southern Boulevard to the Bear Swamp Road, in the Boro. of the Bronx. Charles B. Stover is Pres.

Troy, N. Y.—Bids will be received by the Board of Contract and Supply until Aug. 28 for paving, grading and curbing Burden Ave.; for paving and curbing Alder Ave., and for widening Congress St. Plans are on file at the office of the City Engineer. James M. Riley is Secy. Bd.

***Cortland, N. Y.**—The contract for constructing two miles of fence for State Road and about 1,700 yds. of cobbled paving will be let soon. Thomas Ohern, R. F. D. No. 1, Cortland, N. Y., is interested.

✚**Bayonne, N. J.**—Contracts for street improvement have been awarded by the City Council as follows: For paving Silver St., to the SICILIAN ASPHALT PAVING CO., 41 Park Row, New York, at $8,214; for paving West 38th St., to the UVALDE ASPHALT PAVING CO., 1 Broadway, New York, at $5,584, and East 38th St., at $5,320; for paving Ave. F, to the STANDARD BITULITHIC PAVING CO., 50 Church St., New York, at $27,296.

✚**Camden, N. J.**—The following contracts for paving portions of various streets ware awarded on Aug. 15: For paving Baird Ave., with macadam, at 98 cts. per sq. yd. and constructing vitrified brick gutters at $1.80 per sq. yd., to W. PENN CORSON; for paving Baxter St. with Belgian blocks, to W. PENN CORSON at $2.15 per sq. yd.; for paving Grand St. to theBARBER ASPHALT PAVING CO., at $1.71 per sq. yd.

***Camden, N. J.**—We are officially advised that all bids for constructing a gravel road between Gibbsboro and Berlin have been rejected. New bids will be received by the Board of Freeholders of Camden County, until 10.30 Sept. 7. J. J. Albertson is County Engr.

✚**Hammonton, N. J.**—We are officially advised that the contract for constructing sidewalks on various streets has been awarded to W. KIRK SPEAR at $11,000. Other bids were: Monroe Paving Co., $11,400; McCullough & Connor, $11,475; Cement paving & Contracting Co., $11,850; Clayton E. Shappell, $13,275.

***Rahway, N. J.**—Bids will be received by the Common Council until 8 p. m., Aug. 25, for repaving Main St., from the Pennsylvania R. R. to Commerce St. Franklin Marsh is City Engr., and C. H. Lambert is City Clk. This is a postponement from Aug. 15. Noted on Aug. 10.

Aliquippa, Pa.—Bids will be received by W. W. Lester, Boro. Clk., until 8 p. m., Aug. 28, for paving and grading Beaver Ave., from Rolfe to First Sts.; Fourth St., from Erie to Beaver Ave.; Second St., from Beaver to Main Ave. Plans are on file at the office of R. R. Owens, Boro. Engr., Moore Bldg., Beaver.

✚**Pittsburg, Pa.**—Contracts, it is reported, were awarded by the Department of Public Works on Aug. 10 as follows: Raising streets in the flood district, Northside, to JOHN F. CASEY, at $29,380; repaving Liberty Ave. with blockstone, to BOOTH & FLINN at $23,982; grading, paving and curbing Harwood St. with blockstone, to OTT BROS. CO. at $9,024.

✚The following contracts for road improvement in Pittsburg have been awarded by the County Commissioners: Friday Road, RIDGELY BROTHERS CO., at $19,248; Ben Avon and Lowries Run Road, McLAUGHLIN CONTRACTING CO., $43,920; Glass Run Road, HENRY HILEMAN, $43,764. The roads are to be of Warranite construction. The Buena Vista and Lovedale Road and extension are to be of macadam surface and the contract was awarded to J. W. BUTLER at $64,574.

Tazewell, Va.—The Supervisors of Tazewell County will construct 35 miles of macadam road in Clear Fork, Jeffersonville and Maiden Spring Districts. F. Thompson is Chn.

Fayetteville, W. Va.—Bids will be received by H. W. Claypool, City Recdr., until Sept. 2 for constructing concrete or cement sidewalks. R. H. Dickinson is Mayor.

Aiken, S. C.—Bids will be received by J. L. McCarter, City Clk., until 4 p. m., Aug. 31, for paving with vitrified brick about 7,300 sq. yds. of street. Plans are on file at the office of the City Clerk.

Jacksonville, Fla.—Bids will be received by Philip Priolean, City Engr., until Sept. 5 for repaving Bay St., between Bridge and Market Sts., about 23,268 sq. yds.

Aberdeen, Miss.—Bids will be received by the Road Commissioners of Supervisors of District No. 4 of Monroe County until 2 p. m., Sept. 5, for constructing various road improvements. W. H. Carlisle is Secy.

✚**Brookhaven, Miss.**—The contract for constructing 25 miles of gravel roads has been awarded to the WORTHINGTON CONSTRUCTION CO., Brookhaven, at $3,000 per mile. Noted on July 20.

Ashland, Ohio.—Bids will be received by the Commissioners of Ashland County until 1 p. m., Aug. 30, for macadamizing 1.04 miles of road in Sullivan Township; estimated cost, $6,320; and for grading and macadamizing 1.60 miles of road in Sullivan Township; estimated cost, $9,547. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

✚**Athens, Ohio.**—Bids were received on Aug. 14 by the County Commissioners of Athens County for improving the Nelsonville and Athens Road, as follows: L. H. Nixon and George T. Bowers, Nelsonville, $14,751; CHAS. A. VORHES, Nelsonville, $13,593 (contract awarded); W. S. Bowers, Athens, $15,616; J. A. Grimes, Portsmouth, $14,300; Abner Juniper, Nelsonville, $14,936. Noted on Aug. 10.

Columbus, Ohio.—Bids will be received by the Commissioners of Franklin County until Sept. 15 for the following work: For grading, draining and macadamizing Jones Road, a distance of one mile; and for constructing new sidewalks on the Broad St. bridge across the Scioto River.

✚**East Liverpool, Ohio.**—The contract for improving Cadmus St., from Minerva St. to Mars Alley, has been awarded to RINEHART BROS., at 60 cts. per cu. yd. Estimated cost, $5,280. Noted on Aug. 3.

Elyria, Ohio.—Bids will be received by the Commissioners of Lorain County until 1 p. m., Aug. 29, for grading and macadamizing 1.89 miles of road in Wellington Township. Estimated cost, $6,680. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

Girard, Ohio.—Bids will be received by John A. Howells, Clk. Liberty Township, until noon, Aug. 30, for road improvement in Liberty Township. Plans are on file at the office of William Wilson, Engr., Elks Bldg., Youngstown.

Lisbon, Ohio.—Bids will be received by the Commissioners of Columbiana County until 1 p. m., Aug. 31, for grading and paving with brick 1.08 miles of road in Elkrun Township. Estimated cost, $18,529. The work is to be done under the provisions of the State Highway Law. J. P. Marker is State Highway Comr.

Millersburg, Ohio.—Bids will be received by the Commissioners of Holmes County until 1 p. m., Aug. 28, for grading and macadamizing 1.40 miles of road in Hardy and Berlin Townships. The estimated cost is $9,961. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

✚**New Philadelphia, Ohio.**—Bids were received on Aug. 11 by the County Commissioners of Tuscarawas County for improving the Wooster Road, as follows: SPRINGER & ROGERS, New Philadelphia, $29,660 (contract awarded); J. S. Brown, Newcomerstown, $31,400; Adam Schwab, New Philadelphia, $31,750; W. B. Brown & H. E. Bowling, New Philadelphia, $32,090; Fred Rupenacht, New Philadelphia, $32,200. Noted on Aug. 3.

✚**Norwalk, Ohio.**—The contract for grading and macadamizing 1.57 miles of road in Sherman Township has been awarded to F. L. RICE & SONS, of Shelby, at $9,700. Other bids were: W. C. Heyman & A. A. Meyers, Bellevue, Ohio, $9,875; Taylor & Biggs, Findlay, Ohio, $10,175; Buckeye Engineering Co., Norwalk, Ohio, $10,220; Lyme Construction Co., Bellevue, Ohio, $10,375. Noted on Aug. 10.

Pomeroy, Ohio.—Bids will be received by the Commissioners of Meigs County until 10 a. m., Aug. 31, for grading and paving with brick one mile of road in Scipio Township. Estimated cost, $11,566. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

Springfield, Ohio.—Bids will be received by the Commissioners of Clark County until 10 a. m., Aug. 30, for grading and macadamizing two miles of road in Springfield Township. Estimated cost, $15,255. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

Upper Sandusky, Ohio.—Bids will be received by the Board of County Commissioners until Aug. 25 for improving 7,370 ft. of roadway.

Woodsfield, Ohio.—Bids will be received by the Commissioners of Monroe County until 9 a. m., Sept. 2, for grading and paving with brick 1.08 miles of road in Center Township. Estimated cost, $18,891. The work is to be done under the provisions of the State Highway Law. J. R. Marker is State Highway Comr.

✚**Youngstown, Ohio.**—Contracts for road improvement have been awarded as follows to OATLEY & ENSIGN, at $13,323; C. J. CHINNOCK, at $9,872; GIALDINI & MANGO, at $10,618; McKEE & CO., at $9,265; M. J. KANE, at $5,670; L. H. YOUNG, at $7,675; ROSS O'ROURKE, at $10,603.

✚**Indianapolis, Ind.**—The contract for grading and paving Harwood St. has been awarded to OTT BROS. CO. at $9,024 and for repaving Liberty St. to BOOTH & FLINN at $23,982.

Indianapolis, Ind.—The Board of Public Works will receive bids until 10 a. m., Aug. 25, for grading and paving with gravel the roadway, guttering and paving the sidewalks with cement a portion of the following streets: Pennsylvania, Vermont, Shepard and Woodlawn. C. A. Shrader is Chmn.

Indiana Road Improvement.

Bids will be received as follows for highway improvement in Indiana:

Sept. 4.

Columbus, by the Commissioners of Bartholomew County until 10 a. m. for gravel road construction in Ohio and Rock Creek Townships.

Greensburg, by the Commissioners of Decatur County until 1 p. m. for macadam road in Clinton Township.

Salem, by the Commissioners of Washington County until 1.30 p. m. for road construction in Washington Township.

Vernon, by the Commissioners of Jennings County until 11 a. m. for road construction in Geneva Township.

Sept. 5.

Covington, by the Commissioners of Fountain County until 1.30 p. m. for gravel road in Shawnee Township.

Rockville, by the Commissioners of Park County until 1.30 p. m. for gravel road in Adams Township.

English, by the Commissioners of Crawford County until 2 p. m. for pike road construction.

Winamac, by the Commissioners of Pulaski County until noon for constructing three roads.

Sept. 6.

Lafayette, by the Commissioners of Tippecanoe County until 10 a. m. for gravel road construction.

Monticello, by the Commissioners of White County until noon for stone road construction in Big Creek Township.

Sept. 7.

Laporte, by the Commissioners of Laporte County until 10 a. m. for macadam road in Hanna Township.

Newport, by the Commissioners of Vermillion County until 10 a. m. for gravel roads in Helt Township.

Sept. 8.

Crownpoint, by the Commissioners of Lake County until noon for gravel roads in North, Hobart, St. John and Calumet Townships.

CONTRACTS AWARDED.

Logansport.—The Farlow road to BARNES & GRAUEL at $13,801; the Gray Road and Riley Road to H. A. BARNES & SON at $8,978 and $8,845, respectively; the Ross Road and Stevens Road, to MARTIN McHALE at $16,587 and $16,200, respectively; the Ira Coter Road to SHAFER & BROWNING at $12,500.

Holton.—A macadam road to CLYDE R. YATES at $12,110.

Noblesville.—Gravel roads to W. M. SOCKS at $5,790; to C. C. EDWARDS at $5,547; to FRED WALKER at $8,370.

Wabash.—Gravel road construction to McGREEVEY & SON at $9,700; to McKAY & BROOKMILLER at $7,391.

✚**Pontiac, Mich.**—The contract for paving South Saginau St. and Alleys East and West, has been awarded to LENNANE BROS., Detroit, and the CLEVELAND TRINIDAD PAVING CO., Cleveland, Ohio, at $37,000. William J. Fisher, Pontiac, is Engr.

✚**Freeport, Ill.**—The contract for paving Maple Ave. with macadam has been awarded to GUND GRAHAM CO., of Freeport, at $7,488.

✚**Milwaukee, Wis.**—The contracts for paving various streets, about 198,000 yds., has been awarded to R. F. CONWAY CO., Chicago, Ill., at prices ranging from $1.26 to $1.40 per sq. yd., or an average of $1.311. The total amount of the ten contracts was $254,704. Harry E. Briggs is Comr.

✚**Racine, Wis.**—The contract for paving Owen Ave. with asphalt has been awarded by the Common Council to WESTERN IMPROVEMENT CO., Racine, at $1.50 per sq. yd., and 60 cts. per ft. for combination cement curb and gutter.

West Allis, Wis—Bids will be received by the Common Council until Sept. 2 for macadamizing National Ave., from 53d to 77th Aves. Engineer's estimates: Cutting, 25,930 cu. yds.; filling, 3,791 cu. yds.; crushed stone, 6,604 cu. yds.; gravel, 6,604 cu. yds.; stone gutter paving, 3,220 sq. yds.; stone curbing, 3,278 lin. ft.; combination cement curb and gutter, 12,500 lin. ft. Frank C. Douville is Acting Chn. Bd. of Pub. Wks.

✚**Atchison, Kan.**—The contract for paving Kearney St., from Twelfth to Seventh St., has been awarded to the ATCHISON PAVING BRICK CO., of Atchison, at $22,994; and for paving Waggener Boulevard, from M to P Sts., to ARNOLD & GRAVES, at $6,881.

Little Rock, Ark.—Bids will be received by the Oakland Cemetery Board until 2.30 p. m., Aug. 29, for laying 3,000 ft. of curb guttering. Plans are on file at the office of Edward Reichardt, Supt. of Cemetery. C. J. Kramer is Pres. Bd.

We are officially advised that bids will be received by the Mayor until 2 p. m., Sept. 12, for constructing 29 blocks of asphalt pavement. Plans are on file at the office of Ford & McCrea, 340 Gazette Bldg., Little Rock.

✚***Longview, Tex.**—We are officially advised that the contract for constructing 20,000 sq. yds. of creosoted pine block paving has been awarded to ROACH & MANIGAN, of Fort Worth, Tex. G. A. Bodenheim is Mayor.

Hamlin, Tex.—The City Council is arranging for paving 13 blocks covering the principal business portion of the town.

Salt Lake City, Utah.—Bids for sidewalk improvement have been received by the city as follows: Sidewalk extension No. 132, Smith Bros. Co., $25,-732; P. J. Moran, $25,956; Gillis Construction Co., $26,876; A. P. Mickelson, $27,526; James Kennedy Construction Co., $28,767; Strange & Maguire Construction Co., $29,636; Frank Doran, $30,603; Gilherson Construction Co., $31,267; McKay & Reed, $35,717. For Extension No. 150, Elred & Son, $17,-195; P. J. Moran, $18,127; J. R. Johnson & Co., $18,363; Gondie, Burt & McRae, $18,743; Gillis Construction Co., $19,-995; Strange & Maguire Construction Co., $21,487; C. E. Palm, $21,788; Frank Doran, $21,188; James Kennedy Construction Co., $23,282; extension No. 18, Eldred & Son, $13,323; P. J. Moran, $17,568. G. F. McGonagle is City Engr.

✚**Yamhill, Ore.**—The contract for paving 1,000 ft. on Main St. at North Yamhill, has been awarded to the BITULITHIC PAVING CO., Oregon City, Ore., at $10,000.

✚**Long Beach, Cal.**—The contract for paving Miramar, Terminal, Elliott and 16th Sts., have been awarded to WHITE GASKILL, and I. L. FETTERMAN, Long Beach. The estimated cost of the improvement is $32,000.

✚**Los Angeles, Cal.**—The contract for improving 21st St., from Arlington to Concord St., has been awarded to WITHERS & CRITES, at $10,893.

✚**Los Angeles, Cal.**—The contract for improving Hoover St., between 28th and Jefferson Sts., has been awarded to the FAIRCHILD-GILMORE WILTON CO., at $10,146. Noted on Aug. 17.

✚The contract for improving 16,465 lin. ft. of Eagle Rock Road has been awarded to GAILEY & CLARK.

The following bids for improving 17,343 lin. ft. of Whittier Road were received by the County Board of Supervisors: F. F. Prendergast, (a) grading, 50 cts. per cu. yd.; (b) subgrade and shoulders, 10 cts. per lin. ft.; (c) Class A concrete, $14 per cu. yd.; (d) Class C concrete, $13 per cu. yd.; (e) reinforcing steel, 5 cts, per lb.; (f) pipe railing, $2 per lin. ft.; (g) 18-in. reinforced concrete pipe culvert, $1.50 per lin. ft.; 36-in., $3.50; 24-in., $1.50 per ft.; (h) 12 × 30 metal culvert, $2 per lin. ft; 18-in. semi-circular culvert, $1.50 per lin. ft.; (i) oil macadam paving, $1.34 per ton. G. A. Rogers bid, (a) 35 cts.; (b) 7 cts.; (c) $12; (d) $10; (e) 5 cts.; (f) $2; (g) $2, $3, and $2; (h) $1.70 and $1.20; (i) $1.57. Hudson Johnson Co. bid, (a) 30 cts.; (b) 10 cts.; (c) $12; (d) $11; (e) 4½ cts.; (f) $1.50; (g) $1,25, $3.25, $1.50; (h) $1.28 and $1; (i) $1.27.

✚**Napa, Cal.**—The contract for bitumenizing Brown St. and portions of other streets has been awarded to the CITY IMPROVEMENT CO., at $8,500.

✚**Richmond, Cal.**—The contract for paving Bissel Ave. with asphalt has been awarded to the BARBER ASPHALT PAVING CO., of San Francisco, Cal., at $50,571.

Los Angeles, Cal.—The following bids have been received by the Board of Public Works: For improving Mozart St., The Fairchild, Gilmore, Wilton Co., (a) 17 cts. per sq. ft. for asphalt paving, (b) 28 cts. per sq. ft. for brick paving, (c) 30 cts. per lin. ft. for cement curb, (d) 28 cts. per sq. ft. for vitrified block gutter; Barber Asphalt Paving Co. bid (a) 17 2/10 cts., (b) 17 8/10 cts., (c) 30 cts., (d) 26 3/10 cts.; for improving 20th St., from Alameda to Compton Sts., a distance of four blocks: F. H. McGowan, (a) 11 9/10 cts. per sq. ft. for macadamized pavement, (b) 32 cts per lin. ft. for cement curb, (c) 14 cts. per sq. ft. for cement gutter, (d) 35 cts. per sq. ft. for vitrified block gutter; David Joy, (a) 12⅝ cts., (b) 32 cts., (c) 15 cts., (d) 30 cts.

✚**Hastings, Ont.**—The contract for 50,000 sq. ft. of cement pavement was awarded on Aug. 10 by Alex. Wilson, City Clk., to MARTIN JEX CO., Cobourg. Noted on Aug. 3.

✚**Vancouver, B. C.**—The contracts for street work have been awrded by the City Council as follows: For constructing sidewalks, to D. C. McGARRY, at 14½ cts. per sq. ft., and G. LEDINGHAM, at 13½ cts. per sq. ft.; for paving Tenth Ave., to INDEPENDENCE ASPHALT CO., at $39,500; for paving Park Drive, COLUMBIA BITULITHIC CO., $50,408; for paving Dunlevy Ave., at $23,990, and creosoted block paving on Broadway, at $78,790, to M. P. COTTON CO.

MANUFACTURING PLANTS.

(✚*Denotes a contract awarded.*)

✚**Boston, Mass.**—The contract for the refrigerating plant at the Consumptives' Hospital was awarded to the FRICK CO., at $7,490. Other bids were: Creamery Package Co., $9,973; Bay State Construction & Supply Co., $10,-389.

Cambridge, Mass.—The Cambridge Factory Trust is about to erect a building for stores and cigar factory at Massachusetts Ave. and Windsor St. To be 150 × 86 ft.; to cost $50,000.

Chicopee Falls, Mass.—The Fred T. Ley Co., of Springfield, Mass., and Waterbury, Conn., general contractors for the additions to the plant of the Fiske Rubber Co., have awarded subcontracts for the wood work to ANDREWS & PECK, Hartford, Conn.; steel work, BERLIN CONSTRUCTION CO., Berlin, Conn., and roofing to THE CARY CO. George B. Allen, 193 Ashley St., Hartford, Conn., is the Arch. Noted Aug. 10.

Lowell, Mass.—Plans are being prepared for the erection of an extension to the Lowell Bleachery Co. plant.

The Hamilton Mills has applied for a permit to build a mill between its No. 5 mill and the Appleton Bldg.

✚The contract for the beam and hide house for the American Hide & Leather Co. has been placed with the ABERTHAW CONSTRUCTION CO., of Boston, Building to cover 48,000 sq. ft.

Lynn, Mass.—A bakery and stable, 80 × 175 ft., is to be started soon on Brookline St. Friend Bros. are the proprietors.

Millbury, Mass.—The contract for building an addition to the factory of the West End Thread Co. has been awarded to the FISKE-CARTER CONSTRUCTION CO., 11 Foster St., Worcester. The contract also includes four double dwellings. Chas. T. Main, 201 Devonshire St., Boston, is the Engr.

New Bedford, Mass.—The Kilburn Mill Corporation is about to add a 2-story brick mercerizing mill, 82 × 60 ft.

North Adams, Mass.—The Hoosac Cotton Mills announce that they are about to expend $850,000 in the Union St. district to enlarge and improve the present plant. Wm. M. Butler is Pres. of Co.

North Attleboro, Mass.—The O. M. Draper Co. has been formed for the manufacture of jewelry. Capital, $87,-500. Edwin E. Hale is Pres.

Pittsfield, Mass.—The Berkshire Woolen & Worsted Co. have awarded the contract for a $60,000 addition to their plant to the EASTERN CONSTRUCTION CO., of Woonsocket, R. I. The building will be 68 × 80 ft., three stories high, of fireproof brick construction.

Springfield, Mass.—DANIEL C. SHEA has been awarded the contract for an addition to the plant of H. L. Handy & Co. The building will be of brick, steel and concrete, 27 × 58 ft., three stories high. John Swaine will furnish the steel work.

The contract for the erection of a shop and storage building at 33 Essex St. for B. W. Decatur has been awarded to J. H. DECATUR, 36 Essex St. The building will be four stories high, 38 × 79 ft., of reinforced concrete, with concrete floors, steam heat and freight elevator.

Worcester, Mass.—The R. L. Morgan Co., Worcester, has been reorganized under the name of the Morgan Motor Truck Co. The company has been placed upon a substantial financial basis.

Pawtucket, R. I.—The Kingston Knitting, Dyeing & Bleaching Co. is the name of a new corporation which was granted a charter under the general laws. It is capitalized at $20,000, and will be located at Pawtucket. The incorporators are Frank A. Morrill and John J. Heffernan, of Woonsocket, and Trubee Burrows, of East Providence.

✚**Bridgeport, Conn.**—Casey & Hurley, general contractors for the erection of the plant of the Artistic Bronze Co. on Fairfield Ave. have sub-contracts as follows: Carpenter work, C. A. Bjorklund; plumbing, steam heating and metal work, the W. P. KIRK CO.; gravel roofing, H. C. GOULD & CO.; steel work, the McCATHRON BOILER WORKS; damp proofing, the BURNS CO; cut stone, the JACKSON CUT STONE CO.

Hyland, N. Y.—The TORRINGTON BUILDING CO., Torrington, Conn., have been awarded the contract for the erection of a factory for the Schule Grape Juice Co. One building will be 37 × 73 ft., three stories high, of reinforced concrete, with also roof and elevator. There will also be a power-house 19 × 35 ft. of the same construction. Du Bois Carpenter, Poughkeepsie, N. Y., is the Arch.

Minotola, N. J.—The Minotola Supply Co. has been incorporated by I. L. Shoemaker, J. F. Farms, of Bridgeton, L. I., and I. L. Stetser, of Minotola. The concern is capitalized at $25,000 and will manufacture white goods, linens, silks, laces and embroideries.

✚**New Brunswick, N. J.**—The TORRINGTON BUILDING CO., Torrington, Conn., has been awarded the contract for the erection of an addition to the plant of the Simplex Automobile Co., at New Brunswick. The building will be two stories high and 66 × 319 ft.

Camden, N. J.—Plans and specifications are being prepared for the erection of a group of buildings in Camden for the American Artificial Silk Manufacturing Co. The plant will be located in the East Side and will give employment to a large number of hands.

✚**Erie, Pa.**—A 4-story concrete addition to the Watson paper mill at 16th and Holland Sts., is to be erected. The structure will be put up by the HENRY SHENK CO. It will be 80 × 120-ft. base. In addition an office building will also be erected. The office structure will be two stories in height and 40 × 70 ft. ground.

✚The NEVILLE CONCRETE CO., Neville Island, Pittsburgh, has been awarded the ornamental concrete work for the new pattern storage and pattern shop for the General Electric Co., Erie, Pa. The reinforcing steel to be used in the concrete work will be furnished by the PITTSBURGH STEEL PRODUCTS CO., Pittsburgh. This building will be 75 × 400 ft., six stories high. The general contract is in the hands of the HENRY SHENK CO., Erie.

Media, Pa.—Plans have been prepared by A. G. Thorp, Girard Bldg., for the construction of a shop building. George S. Thorp, Media, Pa., is owner.

Philadelphia, Pa.—It is reported that Richard Jackson will erect an umbrella factory at 22d St. and Sedgley Ave. The probable cost is $12,000.

The laundry building belonging to the Department of Health will be remodeled and improved. Plans by Philip H. Johnson, Land Title Bldg.

Ballinger & Perrot, Archs., have filed plans for a 5-story addition, 56 × 96 ft., to the factory of Dungan Hood & Co., American and Bodine Sts.

✚Repairs will be made to the cigar factory at 435 Market St. J. B. Oblingen is owner. The contract is held by JOSEPH BIRD CO., 213 North Eleventh St.

✚**Pittsburg, Pa.**—The Commonwealth Real Estate Co. has let a contract to W. F. TRIMBLE & SONS CO., of the Northside, for the putting up of a large manufacturing building on Liberty Ave., near 25th St., at a cost of $40,000. The building was planned by F. J. Osterling, is to be of fireproof construction, will cover 180 × 100 ft., and will be partly two and partly one story. The Commonwealth Co. has leased the building to the Brown & Zortman Machinery Co., and the Pittsburg Reinforced Brazing & Machine Co., for a term of ten years.

Northampton, Pa.—The John H. Meyer Silk Manufacturing Co. is to build an addition which will just double the size of the present plant.

Reading, Pa.—The Gehrke Knitting Mills, manufacturing 200 needle ladies' hosiery and men's half-hose, are erecting a new plant on Eleventh St., above Marvine St. It will be a 2-story brick structure, 30 × 100 ft.

Manchester, Pa.—The Manchester Hosiery Mills Co. has been incorporated, capitalized at $10,000. The incorporators are A. R. Reiff, Ralph J. Hilliken, C. H. Marhley, J. C. May, D. E. Brown, Harry Gladfelter, W. H. Everhart and George Schriver. The company will manufacture hosiery and knit goods.

Pittsburg, Pa.—A 3-story factory building, 100 × 180 ft., will be erected by the Schenley Estate. Plans by F. J. Osterling, Commonwealth Bank Bldg.

Pittston, Pa.—A 2-story acid factory will be erected by the Wyoming Chemical Co., Pittston. Davey & Crowthen, 422 Coal Exchange Bldg., Scranton, Pa., are Archs. The cost is about $12,000.

Cumberland, Md.—Cumberland Planing Mill, David Stuart, Prop., will rebuild mill recently burned; 100 × 200 ft., mill construction, boiler room of brick construction; machinery will be installed.

Baltimore, Md.—Harry E. Gilbert, Charles and Lexington Sts., is contemplating the establishment of a feldspar factory on the water front. Details have not yet been announced.

Hagerstown, Md.—The Hagerstown Legging Co. will erect a brick factory, it is reported.

Norfolk, Va.—T. C. Andrews & Co., Campbell's Wharf, purchased water front property, 800 × 120 ft., for $32,-000 and will operate lime plant, 150 × 50 ft. Will open bids on Oct. 1 for buildings and machinery. Capacity, 50 tons of lime per day.

Terra Alta, W. Va.—The woolen mills at Terra Alta are to be rebuilt at once.

Denmark, S. C.—Details are being perfected here for the erection of a cotton mill with a capacity of 15,000 spindles.

Graniteville, S. C.—The Graniteville Manufacturing Co. will make extensive improvements and additions to its cotton factory. Cards, speeders and spinning frames are included in the new equipment.

Jacksonville, Fla.—The industrial department of the Seaboard Air Line Ry. is reported to have completed arrangements insuring the erection of two cotton mills, one at Jacksonville and the other at Denmark, S. C.

✚**St. Petersburg, Fla.**—The TRIUMPH ELECTRIC & ICE MACHINE CO., Cincinnati, has been awarded the contract for the construction of a 30-ton ice plant at St. Petersburg, for the N. C. Williams Co.

Chattanooga, Tenn.—The plant of the Converse Bridge Co., which recently was totally destroyed by fire at a loss of $25,000, will be rebuilt at once.

Chattanooga, Tenn.—A company is being organized by A. J. Gahagan, Chattanooga, to replace the furniture factory of the Loomis & Hart Mfg. Co., recently destroyed by fire.

Daisy, Tenn.—Edwards & Co., Cincinnati, Ohio, will erect a clay-working plant for the manufacture of turpentine cups at Daisy. The probable cost is $10,000.

Alliance, Ohio.—The Michigan Twist Drill Co., Detroit, Mich., will locate in Alliance. A plant will be erected and equipped.

Coshocton, Ohio.—The surveys are being made for an additional warehouse to be built at the Standard plant of the American Art Works.

Coshocton, Ohio. — The Coshocton Glove Co. have decided to double the capacity of its factory in Coshocton. R. F. Timmons, Secy. & Treas.

Toledo, Ohio.—G. S. Mills, 1234 Ohio Bldg., Toledo, Ohio, is preparing plans for a 1-story factory, 400 x 60 ft., with a wing 48 × 60 ft., for the Mather Spring Co., of Toledo. Building to be of brick and steel with concrete floors, fireproof construction. Cost $35,000.

Lancaster, Ohio.—The Lancaster Nitroglycerine plant, which was destroyed by an explosion recently, will be rebuilt.

Martins Ferry, Ohio.—The Riverside Bridge Co., Martins Ferry, will increase its capital stock to $200,000, for the purpose of enlarging its plants and adding to the equipment.

Sandusky, Ohio.—A hospital, kitchen and ice plant is to be erected at the Sandusky Soldiers' Home at a cost of $12,000.

Toledo, Ohio.—The Mather Spring Co., recently incorporated in Toledo, will erect a plant, 70 × 400 ft., for the manufacture of automobile springs.

Rosedale, Ind.—Thomas L. Nevins & Son, whose large flour mill was destroyed by fire, will, it is reported, soon ask for bids to rebuild the mill and elevator.

Gary, Ind.—It is reported that the American Car & Foundry Co., of St. Louis, proposes to construct a car and foundry works.

Detroit, Mich.—Varney & Winter, 58 Equity Bldg., Detroit, are preparing plans and will soon be ready for bids on a 4-story factory, 69 × 536 ft., for the Metzger Motor Car Co., Milwaukee Ave. and G. T. R. R. The building will be constructed of reinforced-concrete, structural iron with concrete floors. Cost, $100,000.

G. U. Pottle, 708 Gas Bldg., Detroit, is preparing plans for a 2 and 3-story factory, 30 × 100 ft., for the Ross & Younge Machine Co., 9 Center St. The building will be of brick and structural iron construction. Cost, $30,000.

Malcomson & Higginbotham, 404 Moffat Bldg., Detroit, are preparing plans for a laundry building for the Detroit Tuberculosis Sanitarium, 817 Ford Bldg.

✚James Shanley, Albion, Mich., has awarded the general contract for a 1-story factory, 85 × 96 ft., to be located on West Boulevard, to WILLIAM HUTH, 109 Maybury Ave., Detroit.

Detroit, Mich.—The Metzger Motor Car Co. will erect a factory, to be four stories, 69 × 536. Plans have been prepared by A. C. Varney and F. J. Winter, 58-62 Equity Bldg.

Cadillac, Mich.—The mill of the Stiles Bros. Lumber Co. has recently been destroyed by fire, entailing a loss of from $25,000 to $40,000. The mill will be rebuilt at an early date.

✚**Wells, Mich.**—The Stephenson Charcoal Iron Co. awarded the contract for superstructure for its new blast furnaces to FREDERICK LA FOREST, Ishpeming, Mich.

Kensington, Ill.—A 2-story bakery, warehouse and store will be erected by the Canova & Marchetti Co., 165 East Kensington Ave. Robert M. Hyde, 218 South La Salle St. The estimated cost is $12,000.

Bloomington, Ill.—The Cooperative Stove Co., Bloomington, has been incorporated, capitalized at $50,000. The incorporators are J. W. Hays, A. C. Hamilton and E. N. Hamilton.

Chicago, Ill.—The Oakdale Iron Co., Chicago, has been incorporated, capitalized at $25,000, to engage in the iron and steel business. The incorporators are Jacob Ringen, Ludwig Loewenstein and M. N. Hirsch.

The Canners Can Co., 4840 South Western Ave., Chicago, will erect a factory building to cost $200,000.

Moline, Ill.—The Williams White & Co. will soon award the contract for the erection of a machine shop adjoining the present plant. The proposed structure will be of steel construction, 52 × 142 ft.

✚**Rockford, Ill.**—The Rockford Machine Tool Co., of Rockford, Ill., has awarded the general contract for the construction of its new shops and power-house to the FREDERICK A. LITTLE CO., Fond du Lac, Wis. The machine shop will be 100 × 200 ft. in size, one story, with a monitor 42 × 100 ft. The power-house will be 60 × 30 ft. in size. A 15-ton electric traveling crane will be required.

Waukegan, Ill.—The Reardon Bros. Manufacturing Co. has been incorporated, capitalized at $15,000, to manufacture women's and chilren's apparel. The incorporators are J. C. Reardon, J. H. Reardon and J. E. Reardon.

Baraboo, Wis.—The American Refractories Co. is planning to increase its capacity at the Devil's Lake quarries. E. M. Allen, Vice-President, is in charge.

Edgar, Wis.—The Edgar Veneer & Mfg. Co. has been organized with a capital of $15,000 by C. C. Barrett, as Pres. The company plans the erection of a veneer factory.

Milwaukee, Wis.—Contracts will soon be awarded for the erection of a main building of the Home Brewing Co. at Holton Brewing Co. The cost will be about $300,000.

Milwaukee, Wis.—Carl Heim, Secy. Home Brewing Co., has awarded the general contract for the construction of the main building of the proposed $500,000 cooperative brewery at Keefe Ave. and Holton St., to the GEORGE LAUBENHEIMER CO., Chicago, Ill. Fred Gatterdam, Chicago, Ill., is Arch. Contracts for the bottling house, garage, administration building and stables will be awarded in about four weeks' time.

Sheboygan, Wis.—The Sheboygan Coaster & Wagon Co. has been chartered. The authorized capital is $40,000. The company succeeds the Thomas Coaster Co. and Beutle Bros. wagon works. Plans are now being prepared by H. J. Weeks, Arch., Sheboygan, for a 4-story brick addition to the Beutel plant, to cost $35,000.

The Sheboygan Ry. & Electric Co. has awarded the contract for the erection of its car stations to ACKERMAN & SONS, Sheboygan, at $16,000. Dimensions, 123 × 80 ft.

Beloit, Wis.—The Berlin Machine Works has purchased eleven acres at Portland, Ore., and proposes to erect a branch plant to be a duplicate of the branch plant at Hamilton, Ont., costing $250,000. Main offices, Beloit, Wis.

Milwaukee, Wis.—The Keystone Glue Co., Williamsport, Pa., has purchased 46 acres between Milwaukee and South Milwaukee and proposes to expend $200,000 in the construction of a glue manufacturing plant.

Waukesha, Wis.—It is reported that the Waukesha Motor Co., Waukesha, Wis., has increased its capital stock from $100,000 to $200,000, the purpose being to provide for an enlargement of its plant and the installation of considerable special machinery.

Mason City, Iowa.—The Colby Motor Co., Mason City, Iowa, will erect an addition to its plant, to be 150 × 400 ft., and two stories high.

Minneapolis, Minn.—Work on a $150,000 plant to be erected by the Crescent Creamery Co., of Minneapolis and St. Paul, will be started about Sept. 1. The building, for which plans are almost finished, will be located in South Minneapolis, though the exact location had not been determined, owing to the firm having options on two sites. Choice of one will probably be made during the week, according to announcement made by C. A. Steel, Mgr.

St. Louis, Mo.—The Newburg Tripoli Co. has acquired a site and will construct a plant for the treatment of tripoli ore mined in Phelps County, Mo. The plant will cost about $25,000.

St. Louis, Mo.—The Ludlow-Saylor Wire Co. will build a 4-story machine shop at 634 South Newstead Ave. Cost, $30,000.

Cleburne, Tex.—H. E. Luck and associates are arranging to establish a factory here for the manufacture of automobiles.

Denton, Tex.—The Denton Cotton Oil & Gin Co. is remodeling the round bale gin here which it recently purchased from the Planters' Compress Co.

Greenville, Tex.—The Missouri, Kansas & Texas Ry. Co. will soon begin the erection of large shops here. A. M. Acheson, Engr., is seeking a site for the proposed shops. It is announced that construction will be started as soon as one is found.

Cuero, Tex.—Thormahlin & Meyer will install bottling works here. The machinery is now arriving on the ground.

New Braunfels, Tex.—The corn shelling plant of Harry Landa that was recently destroyed by fire here will be rebuilt.

Henrietta, Tex.—The Clay County Cotton Oil Co. has formed here with a capital of $67,000. The incorporators are W. B. Worsham, J. B. Dale and E. P. Neville.

Jacksonville, Tex.—The Cherokee Saddlery & Harness Co. has been organized here with a capital of $30,000 for the purpose of manufacturing saddles and harness.

West, Tex.—The Farmers Gin Co. has been organized here with a capital of $14,500. The incorporators are F. E. Denton, C. W. Cowan and E. Lumpkin.

Greenville, Tex.—The Missouri & Texas Ry., will erect shops at Greenville. A site has not been selected. A. M. Acheson, is Ch. Engr.

North Dallas, Tex.—A fertilizing plant will be erected here by Rasmussen Bros. Construction work will soon start.

San Antonio, Tex.—A canning factory will be erected by Dr. F. L. White, Supt., Southwestern Insane Asylum, to be operated in connection with that institution. He will also install an irrigation pumping plant.

San Antonio, Tex.—The construction of a factory here is contemplated by M. W. Durham to manufacture 8-ounce cotton duck, tent and awning cloth.

Taylor, Tex.—The International & Great Northern R. R. will construct car building and repair shops. Five iron-working machines for car repairing work will be installed.

Salt Lake City Utah.—The Burton Mfg. Co. has been organized for the purpose of erecting a plant to manufacture coal tar products. The company is capitalized at $100,000. The incorporators are W. J. Burton, Pres.; W. H. White, Secy., and J. C. McCain, Vice-Pres.

Tucson, Ariz.—The El Paso & Southwestern R. R., which will be extended to Tucson, will erect machine shops, roundhouse, and features of its proposed terminals. The yards will cover 15 acres. George Notman, New York, N. Y., is Secy.

Spokane, Wash.—It is reported that A. L. Cummings and Charles Deggoring will erect a broom factory.

Tacoma, Wash.—The Dibs-Miller Keyseated Self-locking Nut Co. has been incorporated at $1,000,000. The company will manufacture metal furniture. The incorporators are L. A. Dibs, Allen Miller and W. Miller.

Eugene, Ore.—F. M. Eaton and W. A. Brown will erect a plant for the manufacture of vinegar, jellies, apple butter, jams and other fruit products. They will erect a large plant.

Portland, Ore.—The Security Vault & Metal Co. has purchased a site, 200 × 600 ft., on which will be erected a factory.

Portland, Ore.—Bids for the Berlin Machine Works' Portland plant has been secured on Guilds Lake, between Lewis and Wiley hydraulic fill and carshops of the United Rys. Cost, $200,000.

Baker City, Ore.—The Idaho Glazed Cement Pipe Co. has purchased three acres as site for its proposed factory.

✚Oakland, Cal.—The Golden Gate Brewing Co., Fifth and Kirkham Sts., Oakland, awarded contracts through the office of Engineer James T. Ludlow, 604 Mission St., to the CONTINENTAL FIRE PROOFING CO., Monadnock Bldg., for general work, at $15,420, and a contract to V. L. FORTIN & SON, 18th St., Oakland, for the brick work, at $18,160, for the construction of a group of brewing buildings at Seventh and Kirkham Sts., Oakland, to consist of brew house, stock house, steam beer house, shipping house, wash house, engine and boiler house, and cooper shop.

✚Fort William, Ont. — ELLIOTT BROS., Minneapolis, have been awarded the contract for the cold storage and wholesale plant of the Canadian Swift Co. here at a cost of $75,000.

✚Hamilton, Ont.—The contract has been awarded by the Internation Harvester Co. to DAVID DICK & SONS, Welland, for an additional reinforced concrete building to the Hamilton plant. The building will be 400 × 100 ft. in area and will cost in the neighborhood of $250,000. The company contemplates other extensive additions to their plant, two new buildings being under discussion.

Kingston, Ont.—The North American Smelter Co., Kingston, will erect a manufacturing building to cost $40,000.

Ottawa, Ont.—It is reported that a beet sugar factory will be erected.

Madero, Mex.—The Mexican Northwestern R. R. Co. will install machine shops, foundry, round house and car repair shops at Madero State of Chihuahua, at a cost of $1,500,000. The extension of this railroad that is now being constructed betwen Terazzas and Madero will be furnished by December. The construction of three branch lines of this road is also projected.

Torreon, Mex.—La Union, S. A., will install a large amount of machinery in its soap factory here. O. G. Neumann is Mgr.

MISCELLANEOUS CONTRACTS.

(**Denotes that this work is advertised in Engineering News.*)

U. S. RECLAMATION SERVICE.—All news concerning canal and Irrigation projects, etc., will be found under Water Supply—Irrigation.

Stable.—Haverhill, Mass.—A stable to cost $25,000 is to be erected on Stage and Coose Sts. for Dole & Childs. The structure will be of brick, three stories, 108 × 52 ft. J. A. Perkins, 47 Merrimack St., Haverhill, is the Arch.

✚Steel Cells.—Boston, Mass.—The contract for installing steel cells in the Marine Barracks here has been awarded to the VAN DORN IRON WORKS, of Cleveland, Ohio.

Coal Pockets, Stables, Etc.—Worcester, Mass.—About $100,000 will be spent in building a series of coal pockets, stables, etc., by the Peoples Coal Co. Dr. Joseph H. Kelley is Pres.

Tunnel.—Boston, Mass.—Plans have been filed by the Boston & Eastern Electric R. R. Co., for a tunnel under the harbor to a station to be built near Post Office Sq. George Thompson is Chief Engr.

***Removing Rock.**—Newport, R. I.—Bids will be received until 2 p. m., Sept. 15, by Col. Frederic V. Abbot, Corps Engrs., U. S. A., Newport, for removing ledge rock in Pawtucket River, R. I.

***Dredging.**—Bridgeport, Conn.—Bids for dredging in Bridgeport Harbor will be received by Capt. A. E. Waldron, Corps Engrs., U. S. A., New London, Conn., until 3 p. m., Sept. 21.

Pier.—Long Island City (L. I.), N. Y.—The Department of Docks and Ferries has completed plans and specifications for the construction of a pier on the East River at the foot of Nott Ave. Estimated cost, about $25,000. Calvin Tomkins is Comr.

Fire Alarm System.—New York, N. Y.—Bids will be received by the Fire Commissioner until 10.30 a. m., Sept. 5, for furnishing all the labor and materials required for establishing and equipping an extension of the underground fire alarm telegraph system on East End Ave., from 82d to 88th Sts.

***Vacuum Cleaning System.**—New York, N. Y.—Bids were received as follows on Aug. 16 by James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., for installing the vacuum cleaner system in the New York postoffice: Thomas H. Smith Co., New York, 13,990; American Rotary Valve Co., Chicago, Ill., $12,000.

Subway, Retaining Wall.—New York, N. Y.—Bids were received as follows on Aug. 10 by the Commissioner of Bridges for constructing the westerly subway and the Bayard St. retaining wall on the Manhattan Plaza of the Manhattan Bridge: H. E. Fox, 81 East 125th St., $141,000; Charles Meads Co., 165 Broadway, $137,000; Cooper & Evans Co., 206 Broadway, $142,888; Phoenix Construction Co., 41 Park Row, $160,898; Northeastern Construction Co., 325 Fifth Ave., $141,900; Ryan & Parker Co., 165 Broadway, $134,500; Dunbar Construction Co., 444 East 68th St., $154,000; McHarg-Barton Co., 165 Broadway, $146,823; John T. Brady Co., 103 Park Ave., $163,840; Degnon Construction Co., 60 Wall St., $155,000; Rodgers & Hagerty Co., 41 Park Row, $147,000. Oscar Daniel Co., $159,500; H. C. Stowe, Brooklyn, $154,000; Snare & Trieste Co., 143 Liberty St., $143,890; H. Robinson, 251 East 125th St., $160,500. All bidders of New York unless otherwise noted.

Road Oil.—New York, N. Y.—Bids will be received by the Park Board, Dept. of Parks, until 3 p. m., Aug. 31, for furnishing and delivering 1,000 bbls. of emulsifying road sprinkling oil at Prospect Park and the gravel pit, Ocean Parkway, near Ave. P, Boro. Brooklyn.

Repairs to Shelter House.—New York, N. Y.—Bids will be received by the Park Board, Dept. of Parks, until 3 p. m., Aug. 31, for repairs to the shelter house in Bushwick Park, Boro. Brooklyn.

***Subway.**—New York, N. Y.—Charles H. Peckworth, awarded contract for Section 7, Lexington Ave. subway, Tri-Borough Subway system, it is reported, has asked the Public Service Commission to rescind his contract, assigning his reason for refusing to undertake the work to the delay in awarding the contract. Bids for the work were opened on Oct. 27, 1910. It is reported that the Public Service Commission will ask for new bids on this section (No. 7) and also on Section 9 of the Lexington Ave. Subway. Noted on Aug. 3.

***Wagon Shed.**—Fort Terry, N. Y.—Bids will be received until 11 a. m., Sept. 11, by Capt. F. T. Arnold, Constr. Q. M., U. S. A., New London, Conn., for constructing a frame wagon shed at Fort Terry.

Tunnel.—Hauto, Pa.—The contract has been awarded to FRANK HEISTER and OWEN B. WILLIAMS, of Lansford, Pa., it is reported, by the Lehigh Coal & Navigation Co. for driving a tunnel 11 ft. wide, 7½ ft. high from top of rail, from Nesquehoning to Hauto, a distance of five miles.

Pier.—Philadelphia, Pa.—Plans have been prepared by Joseph Hasskarl, Acting Dir. Dept. Wharves and Docks, for the construction of a new pier at Dock St., 120 ft. in width and 582 ft. long, of the 1-deck type, built on a solid concrete foundation to have two railroad tracks, affording belt line connections to the three carriers along the river front. Estimated cost, $250,000.

Freight Elevators.—Philadelphia, Pa.—Bids will be received until noon, Aug. 25, by Joseph F. Hasskarl, Acting Dir. Dept. Wharves, Docks and Ferries, for electric elevators for the Vine St. pier.

Removal of Piers, Etc.—Philadelphia, Pa.—The Department of Wharves, Docks and Ferries has received two bids as follows for the removal of old piers and obstructions from the site of the proposed $250,000 pier at the foot of Dock St., Delaware River. The American Dredging Co., $29,400; American Paving & Construction Co., $36,000.

***Dredging.** — Wilmington, Del.—Bids will be received by Maj. R. R. Raymond, Corps Engrs., U. S. A., until Sept. 15 for dredging in Broadkill River, Del.

***Dredging.** — Wilmington, Del.—Bids will be received by Maj. R. R. Raymond, Corps Engrs., U. S. A., Wilmington, until Sept. 13 for dredging in Tuckerton Creek.

✚Bulkhead. — Baltimore, Md. — The Board of Awards on Aug. 2 awarded the contract for constructing a bulkhead at the old Marine Hospital ground to the McLEAN CONTRACTING CO., Baltimore, at $13,791 for 800 ft. of pile and timber bulkhead.

Buildings.—Washington, D. C.—Bids were received as follows on Aug. 16 by the Secretary of the Interior, Washington, for the construction of four frame buildings at Glacier National Park: Caesar Hairilandt, Kalispell, Mont., $43,050; Joseph Mersch, Everett, Mont., two buildings only, $14,094.

Projectiles.—Washington, D. C.—Bids will be received until noon, Sept. 13, by the Bureau of Ordnance, Navy Dept., Washington, for furnishing 9,000 12-in. and 8,000 8-in. armor-piercing projectiles. N. C. Twining is Ch. of Bureau.

Brass, Steel, Etc.—Washington, D. C.—Bids will be received until Aug. 29 by the Bureau of Supplies and Accounts, Navy Dept., Washington, for furnishing at the navy yards and naval stations the following supplies: Newport, R. I., Schedule 3840, 9,040 lbs. brass rod; 12,620 lbs. tobin bronze rod; miscellaneous brass tubes. Washington, Schedule 3840, 300,000 lbs. ingot copper; 172,500 lbs. steel forgings; 30,800 lbs. forged steel. Schedule 3841, 13,500 lbs. steel blocks; 25,000 ft. 2-conductor oil-proof cable. Brooklyn, N. Y., Schedule 3842, 25,000 ft. white ash; 65,000 ft. yellow pine. Schedule 3845, miscellaneous bar steel; 9,025 lbs. galvanized sheet steel. Schedule 3846, 8,000 ft. steel or w.-i. pipe. Miscellaneous bar iron and sheet lead. Schedule 3849, 3,700 lbs. rod brass; miscellaneous naval rod brass; 3,350 lbs. bar copper; 150,000 lbs. ingot copper; 10,000 lbs. ferro-manganece. Philadelphia, Pa., Schedule 3838, 27,000 lbs. steel I-beams; miscellaneous c.-i. columns. Schedule 3848, 31,300 lbs. plate floor steel. Schedule 3849, miscellaneous sheet brass. Boston, Mass., Schedule 3845, 43,400 lbs. steel angles; miscellaneous bar steel; 11,700 lbs. plate steel. Schedule 3848, 32,500 lbs. plate floor steel. Norfolk, Va., Schedule 3845, 5,000 lbs. galvanized steel shapes; 78,400 lbs. black steel shapes. Schedule 3849, 2,460 lbs. brass pipe; 5,000 lbs. brass tubing; miscellaneous copper tubing. Schedule 3850-3853, composition galvanized gate valves. Applications for proposals should designate the schedules desired by numbers.

Dredging.—Norfolk, Va.—The Atlantic, Gulf & Pacific Co., New York, is the lowest bidder for deepening and draining a portion of the channel in South Branch, Elizabeth River. When completed the channel will be 200 ft. wide, with 22 ft. of water at mean low tide. The sum of $25,000 is available and a further appropriation of $87,500 will be made. Bids were opened on Aug. 2 by Lt. Col. Mason M. Patrick, Corps Engrs., U. S. A., Norfolk.

***Dredging.**—Norfolk, Va.—Bids will be received until noon, Sept. 22, for dredging in James River, Va. Information on application at U. S. Engineer Office, 28 North Ninth St., Richmond, Va.

Piers.—Norfolk, Va.—Henry Steers, 17 Battery Pl., New York, it is reported, has submitted the low bid for the construction of five piers for the Old Dominion Steamship Co., to be built at Atlantic City waterfront, Norfolk, two piers, each 1,000 ft. long; two piers each 800 ft. long; one pier 500 ft. long; also for piling and top decking. Estimated cost, $1,500,000.

Dredging.—Jacksonville, Fla.—Bids were received as follows on Aug. 3 by Capt. George R. Spalding, Corps Engrs., U. S. A., Jacksonville, for dredging at Trout Creek Cut, and constructing shore revetment, St. Johns River: P. Sanford Ross, Inc., Jersey City, N. J., $247,080; M. J. Dady, New York, $221,450; George W. Parkhill, Jacksonville, $255,780; North American Dredging Co. of Texas, Galveston, Tex., $256,650; Coastwise Dredging Co., Norfolk, Va., $267,960.

✚Tallahassee, Fla.—The contract for digging Cypress Creek, Snake Creek and Snapper Creek Canals has been awarded to the MIAMI CONSTRUCTION CO., of Miami, Fla., by the Trustees of the Internal Improvement Fund at 10 cts. per cu. yd. for earth and 25 cts. for rock excavation. The contract was awarded for the whole work or for as much as the Trustees decide to have done.

Lock Tenders' Houses.—Mobile, Ala.—Bids will be received until 11 a. m., Sept. 14, by Maj. C. A. F. Flagler, Corps Engrs., U. S. A., Mobile, for constructing four lock tenders' houses, etc., at Locks Nos. 5, 7, 8 and 9, Black Warrior River, Ala.

Canal Completion.—New Iberia, La.—The citizens have voted to complete the new Iberia Southern Drainage and Commercial Canal as a navigable canal.

Wharf.—New Orleans, La.—Bids will be received until Aug. 28 by the Board of Commissioners of the Port of New Orleans for constructing the Press St. wharf.

Earthwork.—Memphis, Tenn.—Bids were received on Aug. 1 by Maj. Clarke S. Smith, Corps Engrs., U. S. A., Mississippi River Comn., First and Second Districts, Memphis, for about 250,000 cu. yds. of earthwork in Lower St. Francis Levee District. The lowest bid was submitted by Leonard & Bush, of Memphis, at 14.9 cts. per cu. yd.

✚Retaining Wall, Etc.—Nashville, Tenn.—The contract has been awarded, it is reported, by the Louisville & Nashville R.R. Co. to the FOY-PROCTOR CO., of Nashville, for reinforced-concrete retaining walls and underpasses upon its Nashville to Louisville line from Eighth Ave. to Fourth Ave., at about $50,000. The work includes 2,200 cu. yds. of concrete.

Dock.—Toledo, Ohio.—Plans for the construction of a dock to cost approximately $500,000 to be built by the Chesapeake & Ohio Ry. Co., at Toledo, are now being prepared, it is reported, by the engineers of the road.

Canal.—South Bend, Ind.—The Erie-Michigan Deep Waterway Association has been organized to construct a canal from Lake Michigan to Lake Erie across Northern Indiana.

Shafts, Tipple.—Sullivan, Ind.—The J. Wooley Coal Mining Co., of Evansville, Ind., will soon ask for bids for sinking two coal shafts and the construction of tipples near Paxton, in Sullivan County.

Fire Apparatus.—Indianapolis, Ind.—The Board of Public Safety has rescinded all former action in regard to receiving bids for fire apparatus and will again ask for bids for seven new pieces of fire apparatus, five of them

to be motor vehicles and two steam fire-engines. Bids will be received until Aug. 26.

Road Machine.—Laurel, Ind.—George McBarler, Trustee, Perry Township, Franklin County, Laurel, will receive bids for a new road grading machine.

Barns.—Lafayette, Ind.—It is reported that bids will be asked in a few weeks for the rebuilding of the large agricultural and animal barns of Purdue University recently destroyed by fire entailing a loss of $30,000. W. E. Stone is Pres.

Grandstands.—Detroit, Mich.—Work on the new $300,000 concrete stands at Bennett Park, Detroit, will commence shortly after the close of the playing season. The new stands will be of concrete and steel, and will be single-deckers, giving the park a total seating capacity of about 23,000.

Levee Work, Etc.—Carlinville, Ill.—Bids will be received until Aug. 28 by the Morse-Warren Engineering Co., of Carlinville, for work in the Chesterfield Levee District. The work includes 34,000 cu. yds. levee work, 10,000 cu. yds. straightening creek, 36,000 cu. yds. open ditch, culverts, flap doors, etc.

***Channel Excavation.**—Chicago, Ill.—Bids were received by I. J. Bryan, Clk. Sanitary District of Chicago, American Trust Bldg., Chicago, on Aug. 10, for excavation and collateral work on Contract Section 4 of the Calumet Sag Channel of Sanitary District of Chicago, in the Township of Palos, County of Cook, Ill. The approximate quantities for the comparison of bids are: (a) 780,000 cu. yds. of glacial drift; (b) 121,000 cu. yds. of rock excavation; (c) 37,000 sq. yds. of rip-rap slope: Forschner & Sexton Co., Mount Vernon, N. Y., (a) $195,000, (b) $93,170, (c) $18,500, total, $306,670; John Marsch, Chicago, (a) $187,200, (b) $19,640, (c) $46,250, total, $355,090; Shnable & Quinn, Chicago, (a) $237,120, (b) $84,700, (c) $29,600, total, $351,420; National Contracting Co., (a) $249,600, (b) $84,700, (c) $37,000, total, $371,300; John W. Page, Chicago, (a) $265,200, (b) $114,950, (c) $46,250, total, $426,400.

Memorial Gate.—Madison, Wis.—Plans will be received, it is reported, until Sept. 1 by the commissioners appointed by the Governor for a memorial gate to be erected at the Dayton St. entrance to Camp Randall. Cost, not to exceed $12,000. W. J. McKay is Secy.

Drainage District.—Port Washington, Wis.—A petition has been filed in the Circuit Court for Ozaukee County by land owners in the town of Holland, Sheboygan County, and the town of Belgium, Ozaukee County, for the organization of the Belgius-Holland Drainage District and immediate work on the drainage of a tract comprising 750 acres. The petitioners are represented by Albert W. Grady and William F. Schannen, Attys., Port Washington.

Drainage Canal.—Burlington, Wis.—The Hoosier Creek Drainage Commission has recommended the acceptance of the lowest bidders for draining the Hoosier Creek District in Racine County, Wis., as follows: Open ditches, William Whalen, South Milwaukee, Wis., at $23,010; tile ditches, National Drain Tile Co., Streator, Ill., at $7,500. Bids were opened on Aug. 18.

Ditches.—Spooner, Wis.—D. M. Cadwell, Town Clk., will receive bids until 2 p. m., Aug. 26, for the construction of ditches.

***New Channel.**—Clarinda, Iowa.—Bids will be received until 3 p. m., Sept. 12, by the Board of Supervisors of Page County, Clarinda, for the construction of a new channel for the West Nodaway River in Drainage District No. 5. The entire length of the proposed new channel, from Station 0 to Station 657 is 65,700 ft., of which approximately 51,000 ft. are to be excavated and about 14,700 ft. are in the present channel of the West Nodaway River. The width of the bottom of the new channel is to be 20 ft.; average depth, 15.91 ft.; maximum depth, 21 ft.; side slopes, ½ horizontal to one vertical; berm to be 8 ft. wide. The total amount of excavation is estimated to be 848,398 cu. yds., supposed to be all earth, consisting of loam, silt and clay. Part of the right-of-way, which is 100 ft. wide, is covered with timber and must be cleared by the contractor. The entire work will be let in one section designated as Section No. 1. The starting point is about 2½ miles from Villisca, on the main line of the C., B. & Q. R. R., with a good wagon road thereto. C. W. Duke is County Audr. A. S. Van Sandt is Engr-in-Charge.

Ditch Work.—Pocahontas, Iowa.—J. A. Terry, County Audr., will receive bids until 1 p. m., Aug. 30, for the construction of Sections 1 to 5, inclusive, of Ditch No. 64; Sections 1 to 6, Ditch No. 65, and 26 sections of Ditch No. 41. The work approximates 1,143,720 cu. yds. of excavation, besides tile and concrete bulkheads. Bids will be received separately or for the whole work.

Cement.—Council Bluffs, Iowa.—Bids will be received by the Board of Water-Works Trustees, S. L. Etnyre, Supt., until Sept. 7 for furnishing f. o. b. Council Bluffs about 5,000 bbls. of Portland cement in carload lots.

Filling.—Minneapolis, Minn.—Bids be received until Aug. 28 by A. P. Erickson, County Audr., Minneapolis, for Contracts Nos. 26 and 27, for filling the lagoons at the Narrows, Lake Minnetonka. Bids will be received separately or as a whole.

Channel Work.—St. Paul, Minn.—The City Council on Aug. 9 adopted a resolution providing for an appropriation of $2,000 for making preliminary surveys, taking soundings and obtaining releases incident to changing the channel of the Mississippi River and acquiring the levee along the new channel.

✚**Coal Docks.**—Duluth, Minn.—The Carnegie Coal Co. has awarded contracts for the construction of its new coal docks on St. Louis Bay, as follows: Dredging, to ZENITH DREDGING CO., Duluth; superstructure and general contract, to MEAD-MORRISON MFG. CO. The dock will be 2,000 ft. long with a trestle approach of 1,200 ft., and 490 ft. wide. Cost, $800,000. J. H. Sanford is Vice-Pres. and Gen. Mgr. Noted on Aug. 17.

✚**Drainage Ditch.**—Rapid City, S. Dak.—The contract for the construction of a drainage ditch and embankment in the southern part of the city has been awarded to OTTO & COX at 16 cts. per cu. yd. Other bids were: J. E. Parrish & Son, 18 cts.; George M. Swinehart, 16 cts. for the ditch and 25 cts. for the dam; B. J. Grimes, Sturgis, 17½ cts.

✚**Mail-Handling Apparatus.** — St. Louis, Mo.—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded the contract for furnishing the mail-handling apparatus at the St. Louis post-office to the LAMSON CONSOLIDATED STORE SERVICE CO., of Boston, Mass., at $85,875.

✚**Ditch.**—Batesville, Ark.—The contract has been awarded to W. M. SHERWOOD, of Alexandria, Minn., for constructing six miles of levee and drainage ditch by Curia Drainage District No. 1 of Independence County, Ark., at 14 cts. per cu. yd. The work includes about 156,000 cu. yds. of earthwork and 50 acres of clearing. Bids were opened on July 25.

Oil Mains.—Dallas, Tex.—The Texas Co., Houston, Tex., has applied to the City Commission for a franchise to lay a system of oil mains in the city whereby consumers of fuel oil may be supplied from the company's refinery direct.

***Railway Roadbed.**—El Paso, Tex.—See item under Railways.

✚**Quarantine Station.** — Galveston, Tex.—James Knox Taylor, Superv. Arch., Treasury Dept., Washington, D. C., has awarded the contract for the construction of a quarantine station at Galveston to C. L. RYALS, of Galveston, at $86,481.

✚**Dam.**—Monroe, Ore.—The contract has been awarded to T. H. ELLIS for the erection of the concrete dam to be put in the Long Tom River at Monroe by Wilhelm & Son. The dam is to be completed by Sept. 1.

✚**Dredging.**—Los Angeles, Cal.—The Board of Public Works has awarded the contract to the STANDARD AMERICAN DREDGING CO., of San Francisco, for dredging Wilmington Basin and filling in the business center of Wilmington, at $258,000. The work requires the removal of 1,200,000 cu. yds. of earth and filling 15 blocks.

Pipe Line.—Maricopa, Cal.—The Guaranty Oil Co. is preparing to construct a pipe line from Maricopa to Ventura. The work, which will be done by contract, will require the following: Trenching, estimated cost, $110,000; six power plants, $150,000; bridging, $30,000; telephone line, $150,000; 60 miles of pipe, $364,920; steel tanks, $30,000; grading, $97,000.

✚**Dredging.**—San Francisco, Cal.—The contract has been awarded to the SAN FRANCISCO BRIDGE CO. for dredging in San Pablo Bay, Cal., 2,500,000 cu. yds., at 18⅞ cts. per cu. yd., or $473,007. Bids were opened by Lt. Col. T. C. Rees, Corps Engrs., U. S. A., San Francisco. List of bidders noted on Aug. 10.

Steel Tanks.—Hemet, Cal.—The Standard Oil Co. will soon erect here three steel tanks with a capacity of 19,000 gallons each and accompanying warehouses and office buildings.

Docks.—Oakland, Cal.—Plans for a system of docks for the United Properties here are nearing completion. The new docks will accommodate the largest steamers afloat by the time the Panama Canal is opened, and the Key Route, one of the properties of the United companies, will have a mole 1½ miles long and 1,000 ft. wide, on which transcontinental freight can be trans-shipped and stored in warehouses which will be built along the mole at the edge of the deep water. W. R. Alberger is Vice-Pres.

✚**Wharf.**—San Diego, Cal.—The McCormick Lumber Co. has awarded a contract to WHEELER & CO., of Los Angeles, Cal., for the construction of 1,400 ft. of wharf at the foot of 25th St., at $60,000. Concrete piling will be used, the work to begin at once.

Addition to Elevator.—Montreal, Que.—The Harbor Commissioners have engaged the John S. Metcalf Co., Ltd., 54 St. Francis Xavier St., Montreal, as designing and constructing engineers on the erection of an addition to the new 1,750,000-bushel fireproof elevator, to be completed next spring. The addition will have a capacity of 850,000 bushels and will be built by the Commissioners' own forces to meet the demands for storage purposes at present. The total capacity of the new grain elevator, with the addition, will be 2,600,000 bushels.

✚**Breakwater.**—Port Arthur, Ont.—The contract for the construction of the breakwater extension from Bare Point in a westerly direction, 3,200 ft., has beeen awarded to the THUNDER BAY CONTRACTING CO.

✚**Dam.**—Port Arthur, One.—SEAMAN & PENNIMAN, of Ft. William, have been awarded the contract for completing the Current River service dam, at about $30,000.

✚**Cement Platform, etc.** — Ottawa, Ont.—The contract has been awarded to the JOHN S. METCALF CO., LTD., 54 St. Francis Xavier St., Montreal, Que., for the cement platform and canopy for the Grand Trunk Ry. depot here, at $100,000.

✚**Dredging.**—Ottawa, Ont.—We are officially advised that contracts for dredging at various places have been awarded as follows by the Department of Public Works, R. C. Desrochers, Secy., Ottawa: At Midland, Ont., to the CANADIAN DREDGING CO., LTD., of Midland; River St. Francis to TREFFLE BASTIEN, JAMES LAURIN, W. C. LEITCH, of Montreal, Que.; St. Pierre les Becquets, Que., to the W. J. POUPORE CO., LTD., of Montreal.; Berthierville, Que., to same; Batiscan River, Que., to same; St. Maurice River, Que., to same.

Spikes, Etc.—Toronto, Ont.—Bids will be received by the Chairman of the Board of Control until noon, Aug. 31, for the supply of the following: (a) 325 kegs track spikes, 200 per keg, size of spike 5½ × 9/16 in., measured under head; (b) 1,950 pairs of splice bars; (c) 9,500 tie rods, ⅞-in. diameter. Specifications and form of proposal may be obtained on application to the Department of Railways and Bridges, City Engineer's office. Bids may be submitted separately or for all.

Wharf and Breakwater.—Thornbury, Ont.—Bids will be received until Sept. 13, by R. C. Desrochers, Secy., Pub. Wks. Dept., Ottawa, Ont., for the construction of a breakwater and an extension to wharf here. Plans, specifications and form of contract can be seen and forms of proposal obtained at the Department, Ottawa, or from J. G. Sing, Dist. Engr., Confederation Life Bldg., Toronto; H. J. Lamb, Dist. Engr., London, and the Postmaster, Thornbury.

Breakwater and Dredging. — Port Stanley, Ont.—Bids will be received until Sept. 13 by R. C. Desrochers, Secy., Pub. Wks. Dept., Ottawa, for the construction of a breakwater and dredging at Port Stanley. Plans, specifications and form of contract can be seen and forms of proposal can be obtained at the Department, Ottawa, or from J. G. Sing, District Engr., Confederation Life Bldg., Toronto; H. J. Lamb, Dist. Engr., London, or the Postmaster, Port Stanley.

Pier.—Wheatley, Ont.—Bids will be received until Sept. 13 by R. C. Desrochers, Secy., Pub. Wks. Dept., Ottawa, for the construction of a landing pier. Plans, specifications and form of contract can be seen and forms of proposal obtained at the Department, Ottawa, or at the office of J. G. Sing, Dist. Engr., Toronto; H. J. Lamb, Dist. Engr., London, or the Postmaster at Wheatley.

Fire Apparatus.—Winnipeg, Man.—Bids will be received until Sept. 25 by the Board of Control, M. Peterson, Secy., for the supply of the following fire apparatus: Two 60-HP. motor hose-wagons; one 85-ft. aerial ladder-truck; 30 fire alarm boxes complete. Specifications and forms of proposal, etc., may be obtained at the office of the Chief of Fire Department, Central Fire Station.

✚**Seawall.**—Victoria, B. C.—The contract for the Ross Bay seawall has been awarded to THOMAS STEDHAM, at $69,301.

U. S. POSSESSIONS AND CUBA.

✚**Cranes.**—Panama.—The contract, it is reported, has been awarded to the MAINE ELECTRIC CO. for eight 4-ton electric cargo handling cranes for the pier at Balboa, the Pacific entrance to the Isthmian Canal, at $10,466 per crane.

✚**Power Plant.**—Hawaii.—The Bureau of Yards and Docks, Navy Dept., Washington, D. C., has awarded the contract for the construction of a power plant at Pearl Harbor, H. T., to C. C. MOORE & CO., of San Francisco, Cal., at $158,000.

✚**Steel Tracks.** — Panama. — The BETHLEHEM STEEL CO., of South Bethlehem, Pa., has been awarded the contract for steel tracks for the machines which will tow vessels through the locks of the Panama Canal at $29,187 for 1,250 tons of steel.

Steel Bars, Lumber.—Panama.—Bids will be received until Sept. 1 by Maj. F. C. Boggs, Corps Engrs., U. S. A., Gen. Purchasing Officer, Isthmian Canal Comn., Washington, D. C., for furnishing mechanical-bond steel bars and lumber, per Circular No. 644.

Fuel Oil Wharf.—Guantanamo, Cuba.—Bids were received as follows on Aug. 12, by the Bureau of Yards and Docks, Navy Dept., Washington, D. C., for the construction of a fuel oil wharf, Guantanamo, Cuba: HENRY MONK, Pensacola, Fla., (sole bidder), $17,600

Turbo-Generator. — Panama. — The only bid received on Aug. 11 by Maj. F. C. Boggs, Corps. Engrs., U. S. A., Gen. Purchasing Officer, Isthmian Canal Comn., Washington, D. C., for one 500-KW. turbo-generator unit was that of the General Electric Co., of Schenectady, N. Y., at $26,623, if delivered in 90 days, and $24,143 if in 160 days.

Steel Rails, Etc.—Bids will be received by Maj. F. C. Boggs, Corps Engrs., U. S. A., Gen. Purchasing Officer Isthmus Canal Comn., Washington, D. C., until 10.30 a. m., Sept. 6, for furnishing steel rails, etc. Blanks and general information relating to this circular, No. 643, may be obtained at Washington, or at the offices of the Assistant Purchasing Agents, 24 State St., New York; 614 Whitney-Central Bldg., New Orleans, La., and 1086 North Point St., San Francisco, Cal., also from the U. S. Engineer offices in the following cities: Seattle, Wash.; Los Angeles, Cal.; Baltimore, Md.; Philadelphia, Pa.; Pittsburg, Pa.; Boston, Mass.; Buffalo, N. Y.; Cleveland, Ohio; Cincinnati, Ohio; Chicago, Ill.; St. Louis, Mo.; Detroit, Mich.; Milwaukee, Wis.; St. Paul, Minn.; Chattanooga, Tenn.; Louisville, Ky.; Mobile, Ala., and Galveston, Tex.; Commercial Club, Kansas City, Mo.; Chamber of Commerce, Quincy, Ill., and Chamber of Commerce and Board of Trade, Tacoma, Wash.

EXAMINATIONS.

(✚*Denotes a contract awarded.*)

Fuel Engineering Chemist. — New York, N. Y.—The Municipal Civil Service Commission, 299 Broadway, New York, will receive applications until Aug. 31 at 4 p. m., for the position of Fuel Engineering Chemist and Engineering Chemist, to be held on Sept. 21, at 10 a. m. The subjects and weights of the examination are as follows: Technical, 6; experience, 4; 75% will be required on the technical paper and 70% on all. There are two vacancies at $1,800 in the Standard Testing Laboratory and one vacancy at $1,500. Minimum age, 21 years. F. A. Spencer is Secy.

Bacteriologist.—New York, N. Y.—The Municipal Civil Service Commission, 299 Broadway, New York, will receive applications from Aug. 9, until 4 p. m., Aug. 23, for the position of Bacteriologist. The examination will be held on Sept. 7, at 10 a. m. The subjects and weights of the examination are as follows: Technical, 6; experience, 4; 75% required on technical paper and 70% on all. The examination will be divided into four classes: Candidates for Class I. and Class II. must be graduate physicians; candidates for Class III. and Class IV. need not necessarily be graduate physicians. The requirement of citizenship is waived for this examination. Vacancies, six in the Department of Health. Salary, $1,200 to $1,800 a year. Applicants must have reached their 21st birthday. F. A. Spencer is Secy.

INDUSTRIAL NOTES.

"Wood Preservation for Electric Railways" is the title of an interesting little booklet recently issued by the C-A-Wood Preserver Co., St. Louis, Mo. In this booklet is explained the particular advantages of this wood preserving, especially where the electric railway is concerned.

Railway Equipment.—The New York, Westchester & Boston R. R. has recently purchased 60 steel coaches from the Standard Steel Car Co.; there are also under negotiation 4,435 cars for the Missouri Pacific, 2,000 for the Illinois Central, 1,200 for the Wabash, 1,000 for the Seaboard Air Line, 1,000 for the Monon, 975 for the Queen & Crescent, 500 for the Havana Central, 100 for the Proctor & Gamble Co., 150 for the Manufacturers' Railway, and passenger equipment for the Pennsylvania, Baltimore & Ohio and other roads, aggregating about 1,000 coaches.

Mr. Ashley F. Peck, for six years identified with Allis-Chalmers Co. as sales engineer, connected with their New York office, has recently associated himself with the Terry Steam Turbine Co., as district sales manager for the Middle eWst, with offices at 814 People's Gas Bldg., Chicago, Ill. Mr. Peck, prior to 1902, was actively connected with the machinery sales field of Chicago, and since that date, for three years, was manager of the Milwaukee district sales office of the National Electric Co., going from Milwaukee to Allis-Chalmers Co., at New York in 1905.

The Automobile Trade.—In an interview recently given by Mr. Benjamin Brisco, President of the United States Motor Co., he states that the automobile output in 1912 will break all records and 210,000 pleasure cars will be built. In 1910 there were built in the United States 186,000 automobiles at an average cost of $1,533. Figures for 1911, that is the year ending June 30, are not available, but it is estimated that the output was less than in 1910. Mr. Brisco estimates that the average cost of automobiles in 1912 will be $1,100. This indicates that the manufacturers of automobiles believe there will be a recession as compared with the banner year 1910 for, according to figures supplied, the cost of all the automobiles built in 1910 was $2,850,000,000 while those to be built in 1912 will only total $2,300,000.

The Birmingham & Northwestern Ry. is now under construction between Dyersburg and Jackson, Tenn. The road goes through a well settled and rich agricultural country and it is expected to get considerable traffic in timber, cotton, corn and other products. The grading began in May has been pushed ahead rapidly and is now more than three-quarters completed. The road is 48 miles in length and the work mostly very light with maximum grade of 1% and nothing over a 4° curve.

There is not a steel bridge nor a piece of masonry on the whole road. Pile trestles are used wherever the drainage is too great to be taken care of by a pipe, and later on a more permanent structure can be substituted; 70-lb. rail will be used. The work has been carried on most economically and the total cost of construction will be remarkably low. It is expected to have the road completed in October or in time for this season's cotton crop. J. W. Wright is the contractor, and M. Harvey, Jackson, Tenn., is the Ch. Engr.

Railways in Oklahoma.—Oklahoma has 6,074.69 miles of main line railroad track, and 1,381.13 miles of side track, according to reports of individual roads made to the Oklahoma Corporation Commission. The greatest mileage is possessed by the St. Louis & San Francisco, which is 1,497.96 miles of main line and 296.85 miles of side track. Second in point of mileage is the Rock Island with 1,326.27 miles of main line and 356.96 miles of side track. Other main line mileage is as follows: Atchison, Topeka & Santa Fe, 850; Missouri, Kansas & Texas, 691.52 main line and 38 miles of second track; Midland Valley, 245.95; Fort Smith & Western and St. Louis, El Reno & Western, 241.97; Missuori, Oklahoma & Gulf, 211.48; Kansas City, Mexico & Orient, 187.05; Wichita Falls & Northwestern, 177.12; St. Louis, Iron Mountain & Southern, 161.59; Kansas City Southern & Arkansas Western, 152.31; Oklahoma Central, 133.76; Gulf, Colorado & Santa Fe, 100.30; Texas, Oklahoma & Eastern, 24; Clinton, Oklahoma & Western, 21.52; Poteau Valley, 7.74; Oklahoma & Miami 4.45; Choctaw, Newcastle & Western, 2 miles.

LIST OF CONTRACTS PENDING

Plans and Specifications on File.

The following plans (P.) and Specifications (S.) are on file for reference only unless otherwise noted at the office of The Engineering News Publishing Co., 220 Broadway, New York.

Bids close.		Noted in issue of
8-25	Dams, canals, St. Ignatius, Mont. (S.)	8- 3
8-26	Pavement, etc., Newport, R. I. (S.)	8-10
8-26	Dredging, etc., New York, N. Y. (S.)	8- 3
8-28	Breakwater, Detroit, Mich. (S.)	7-27
8-28*	Tug, Duluth, Minn. (P. & S.)	8- 3
8-29	Harbor work, Michigan City, Ind. (S.)	8- 3
8-29	Ditches, Brownsville, Tex. (S)	8- 3
8-31*	Crib, Cleveland, Ohio, (P. & S.)	8-17
9- 1*	Dredging, etc., Minneapolis, Minn. (P. & S.)	8-10
9- 1	High school, South Bend, Ind. (P.&S.)	7-27
9- 2	Grading, Newport, R. I. (S.)	8-10

Light, Heat and Power Plants.

Bids close.		Noted in issue of
8-25*	Wiring, etc, New York, N. Y.	8- 3
8-25	Electric elevator, Philadelphia, Pa	8-24
8-29	Electric light plant, Monet, Mo.	8-17
8-31	Generator sets, Los Angeles, Cal.	7-13
9- 4	Moving machinery, Jacksonville, Fla.	8-17
9- 5	Maintenance of gas and gasoline lamps, St. Paul, Minn.	8-17
9- 5	Elecric light and water plant Honea Path, S. C.	8-24
9- 5	Electric light plant, Clarksdale, Miss.	8-24
9- 7	Street light equipment, St. Paul, Minn.	8-17
9-15	Mechanical equipment, Washington, D. C.	8-17
9-15	Electric elevator plant, Washington, D. C.	8-17
9-25	Electrical supplies, Brazil (Foreign)	7-27
9-31	Hydro-electric power plant, Riverdale, Utah	8-24
1-30, 1912	Power generating and pumping plants, Australia (Foreign).	6-15

Bridges.

Bids close.		Noted in issue of
8-25	Bridge, Cincinnati, Ohio	8-17
8-25	Bridge, Winnipeg, Man	8-17
8-25	Bridge, Kent, Wash	8-10
8-25	Bridge construction and abutments, Alexander, Man.	8-17
8-25	Bridge, Three Rivers, Que.	8-24
8-26	Bridge, etc., Newmarket, Ont.	8-24
8-26	Bridge, Clayton, Ill.	8-24
8-26	Bridge work, Cleveland, Ohio	8- 3
8-28	Bridge, Tallulah, La.	8-10
8-28	Bridge, Lancaster, Ohio	8-10
8-28	Bridge, Waverly, La.	8-17
8-28	Three steel bridges, Springview, Neb.	8-17
8-28	Culverts, Los Angeles, Cal.	8-24
8-28	Bridge, Los Angeles, Cal.	8-24
8-28	Bridge, La Crosse, Kan.	8-24
8-29	Bridge, Fall River, Mass.	8-17
8-31	Bridge, Trail, B. C.	8-10
8-31	Bridge, Bermuda, La.	7-27
9- 1	Bridges, Siam (Foreign)	6-29
9- 1	Bridges, Lamarque, Tex.	8-24
9- 2	Bridge, New Athens, Ill.	8-24
9- 2	Bridge, Youngstown, Ohio	8-10
9- 4	Bridge, Grenada, Miss.	8-17
9- 4	Bridge, Wanilla, Miss.	8-24
9- 5	Bridges, Kingston, N. Y.	8-24
9- 5	Bridge, Colusa, Cal.	8-24
9- 6	Bridges, etc., Wentworth, N. C.	8-24
9- 6	Bridge, etc., Salinas, Cal.	8-24
9- 6*	Bridge, Tampa, Fla.	7-13
9- 7	Bridges, Muncie, Ind.	8-17
9- 7	Bridge, etc., Laporte, Ind.	8-24
9- 8	Bridges, etc., Cincinnati, O.	8-24
9- 9	Bridge, Quincy, Ill.	8-17
9-11	Bridge, Kansas City, Kan.	8-24
9-11*	Bridges, Angleton, Tex.	8-24
9-11	Bridge widening, Port Chester, N. Y.	8-24
9-14*	Bridge, Reading, Pa.	8-17

Buildings.

Bids close.		Noted in issue of
8-24	School, Marion, Iowa	8-24
8-24	School, Clayville, Pa.	8-24
8-24	School, Canton, Ohio	8-24
8-24	Addition to court house, Wadena, Minn.	8-24
8-24	School, Rice, Minn	8-24
8-25	School, Oakmont, Pa.	8-24
8-25	School, Wapello, Iowa	8-24
8-25	Station, Truro, N. S.	8-24
8-25*	Armory work, Brooklyn, N. Y.	8-24
8-25	Station, Truro, N. S	8-10
8-25	School, Oneida, N. Y.	8-17
8-28	School, Plattsburgh, N. Dak.	8-24
8-28	Barn, Canton, Mass.	8-24
8-29*	Repairs to capitol, Albany, N. Y.	8-17
8-29	U. S. post-office, Wallingford, Conn.	7-20
8-29	U. S. post office, Monroe, Mich.	8- 3
8-29	Courthouse, Cody, Wyo	8-24
8-29	Barn, Dayton, Ohio	8-24
8-29	High school, South Bend, Ind.	8-24
8-29	Building, Wooster, Ohio	8-24
8-30	Building, Worcester, Mass.	8-24
8-30*	Post-office, Eufaula, Ala.	7-27
8-31	Terminal bldg., Quebec, Ont.	8-10
8-31*	Prison, Comstock, N. Y.	8-10
8-31	Addition to post-office, Grand Rapids, Mich.	8-17
8-31	School, Newport, Ky.	8-24
8-31	Auditorium, Philadelphia, Pa.	8-24
9- 2	Court-house, Indianapolis, Ind.	8-10
9- 2	Bank, Covington, La.	8-24
9- 2	Library, Janesville, Minn.	8-24
9- 5	Hotel bldg., Albany, Ga.	8-10
9- 5*	U. S. post office, Gadsden, Ala.	8- 3
9- 5	Library building, Cleveland, Ohio	8-17
9- 5	Armory, Clyde, Ohio	8-24
9- 5	Library, Avondale, Ohio	8-24
9- 5	Building, Weyburn, Sask.	8-24
9- 6	Home, Jamesburg, N. J.	8-24
9- 6	Building, Pittsburg, Pa.	8-24
9- 7	U. S. post-office, Ensley, Ala.	8-10
9- 8	U. S. post-office, Pontiac, Ill.	8-10
9-11	Church building, Cedar Rapids, Iowa	8-17
9-14*	U. S. post-office and court-house, Grand Rapids, Mich.	8-24
9-12	U. S. post-office, Athol, Mass.	8-17
9-14	Sanitarium, Elizabeth, N. J.	8-24
9-15	U. S. post-office, Pendleton, Ore.	8-24
9-15	U. S. post-office, Washington, D. C.	8-10
9-15	School, Hot Springs, Ark.	8-10
9-15	Church, Stamford, Conn.	8-10
10- 3*	Filtration plant, Montreal, Que.	8-10

Water-Works.

Bids close.		Noted in issue of
8-24	Water pipe, Charlotte, N. C.	8-24
8-24	Crib work, Chicago, Ill.	8-24
8-25	Laying pipe, Boston, Mass.	8-24
8-25	Pump, Plattsville, Wis.	8-10
8-25	Dams, canals, St. Ignatius, Mont.	8- 3
8-25	Reservoir, West Liberty, Iowa	8-17
8-25	Water-works, Benedict, Neb.	8-17
8-26	Water pipe, Oakley, Ohio	8-17
8-26	Reservoir work, Brookfield, Mass.	8-24
8-28	Pipe, Springfield, Ill.	8-24
8-28	Tank, etc. Alice, Minn.	8-17
8-28*	Watermain extensions, Minot, N. Dak.	8-10
8-29*	Pumps, Muskogee, Okla.	8- 3
8-29	Tank, Elroy, Wis.	8-24
8-30	Pumping, etc., work, Kansas City, Mo.	8-24
8-30*	Boilers, Kansas City, Mo.	8-17
8-30*	Water system, Shelburne Falls, Mass.	8-24
8-31*	Crib, Cleveland, Ohio	8-17
8-31	Well, Wheatland, Iowa	8-17
8-31	Reservoir, Juniata, Pa.	8-24
9- 1	Pipe, Newbern, N. C.	8-24
9- 1	Water supply, Norfolk, Va.	8-24
9- 1*	Water-works material, Fort Worth, Tex.	
9- 1	Well, Osage, Iowa	8- 3
9- 1	Canal extension, etc., Huntley, Mont.	8- 3
9- 1	Water-works, Honea Path, S. C.	8-10
9- 1*	Pumping engines, Boston, Mass.	8-17
9- 2	Pipe laying, etc., Sparta, Wis.	8-24
9- 2	Water pipe, Crawford, Neb.	8-24
9- 4	Water pipe, Homestead, Pa.	8-24
9- 4	Water supply, Manhattan, Mont.	8-17
9- 4	Tower, Fresno, Cal.	8-17
9- 4*	Water-works, Dorris, Cal.	8-17
9- 5	Water extensions, Clarksdale, Miss.	8-17
9- 5	Fire mains, etc., Rush City, Minn.	8-17
9- 5*	Pumps, Muskogee, Okla.	8-17
9- 5	Water impvt., Muskegon, Mich.	8- 4
10- 1	Pumping machinery, Brit-	
9- 5	Waterpipe, West Milwaukee, Wis.	8-24
9- 5*	Purifying plant, Muskogee, Okla.	8-24
9- 5	Water-works, Burden, Kan.	8-24
9- 5	Water pipe, Winnipeg, Man.	8-24
9- 6	Extension of mains, Decorah, Iowa	8-24
9- 6	Water main, Omaha, Neb.	8-24
9- 7	Softening plant, Sawtelle, Cal.	8-24
9- 7	Pumping engine, Council Bluffs, Iowa	8-24
9-12*	Intake pipe, Windsor, Ont.	8-24
9-15	Well, Sioux Falls, S. Dak.	8-24
9-15	Pump, Grand Forks, N. Dak.	8-24
9-16	Pumping engine, Canton, Ill.	8-24
9-25*	Filtration plant, Fairfield, Iowa	8-24
10- 1	Tanks, Norfork, W. Va.	8-24
	ish India (Foreign)	8-10
10-11*	Water-works, Colonial Beach, Va.	8-24

Sewers.

Bids close.		Noted in issue of
8-25	Sewers, Shelbina, Mo.	8-10
8-25	Sewer, Altoona, Pa.	8-24
8-25	Pipe sewers, etc., Boston, Mass.	8-24
8-25	Conduit, Boston, Mass.	8-10
8-28	Sewers, North Toronto, Ont.	8-17
8-28	Sewers, Kokomo, Ind.	8-24
8-29	Sewers, South Bend, Ind.	8-24
8-30*	Sewers, Bucyrus, Ohio	8-24
8-30	Sewers, Milan, Mich.	8-24
8-30	Sewer, New York	8-24
8-30*	Sewer, Franklinville, N. Y.	8-17
8-30	Sewers, New York, N. Y.	8-10
8-31	Sewer, Wapello, Iowa	8-17
9- 2	Drain tile, Peru, Ind.	8-24
9- 4	Sewers, Mitchell, S. Dak.	8-24
9- 5	Sewer, Newburgh, N. Y.	8-24
9- 5	Sewer, Wallingford, Conn.	8-24
9- 5	Drain pipe, Paducah, Ky.	8-24
9- 5	Sewer, Westfield, N. J.	8-17
9- 5	Sewers, Clarksdale, Miss.	8-17
9- 6*	Sewers, Baltimore, Md.	8-17
9- 6	Laying pipe, New Bedford, Mass.	8-24
9- 6	Sewer pipe, etc., Prescott, Ark.	8-24
9- 6	Sewer, Galveston, Tex.	8-24
9- 7	Sewers, Bucknell, Ill.	8-24
9- 7	Sewers, Ansonia, Conn.	8-17
9-11	Sewer, Lemore, Cal.	8-17
9-11*	Sewers, New Orleans, La.	7-13
9-11	Sewer, Lake Charles, La.	8- 3
9-12*	Sewers, Toronto, Ont.	8-24
9-15	Disposal plants, Rock Hill, S. C.	8-24
9-15	Sewers, Terra Haute, Ind.	8-17
9-28	Tilt drain, Bethany, Ill.	8-24
10-11*	Sewers, etc., Colonial Beach, Va.	8-24

Streets and Roads.

Bids close.		Noted in issue of
8-25	Paving, Indianapolis, Ind.	8-17
8-25	Road impvt., Cincinnati, O.	8-10
8-25	Street improvement, New York, N. Y.	8-17
8-25*	Paving, Rahway, N. J.	8-24
8-25	Paving, Derby, Conn.	8-24
8-25	Road improvement, Upper Sandusky, Ohio	8-24
8-25	Paving, Naugatuck, Conn.	8-24
8-26	Street improvement, New York, N. Y.	8-17
8-26	Pavement, etc., Newport, R. I.	8-10
8-26	Road improvement, Castalia, Ohio	8-17
8-28	Macadam road, New Philadelphia, Ohio	8-10
8-28	Repairing, etc., New York, N. Y.	8- 3
8-28	Macadamizing, Millersburg, Ohio	8-24
8-28	Paving, etc., Troy, N. Y.	8-24
8-28	Paving, etc., Aliquippa, Pa.	8-24
8-29	Macadamizing, Elyria, Ohio	8-24
8-29	Paving, Boston, Mass.	8-24
8-29	Curb guttering, Little Rock, Ark.	8-24
8-29	Street improvement, Caldwell, Ohio	8- 3
8-29	Macadamizing, Spokane, Wash.	8-17
8-30	Macadamizing, Charleston, Ill.	8-17
8-30	Macadamizing, Springfield, Ohio	8-24
8-30	Sidewalks, etc., Boston, Mass.	8-24
8-30	Road improvement, Girard, Ohio	8-24
8-30	Macadamizing, Ashland, O.	8-24
8-31	Paving, Lisbon, Ohio	8-24
8-31	Gravel, New York, N. Y.	8-24
8-31	Road oil, New York, N. Y.	8-24
8-31	Paving, Aiken, S. C.	8-24
8-31	Paving, Pomeroy, Ohio	8-24
8-31	Roads, Winchester, Ind.	8-17
8-31	Road, Greenfield, Ind.	8- 3
9- 1	Soil work, Boston, Mass.	8-24
9- 2	Paving, Woodsfield, Ohio	8-24
9- 2	Macadamizing, West Allis, Wis.	8-24
9- 2	Sidewalks, Fayetteville, W. Va.	8-24
9- 2	Paving, Chile (Foreign)	7-27
9- 2	Grading, Newport, R. I.	8-10
9- 2	Road, Greencastle, Ind.	8-17
9- 2	Road, Evansville, Ind.	8-17
9- 4	Roads, Rushville, Ind.	8-17
9- 4	Road, Decatur, Ind.	8-17
9- 4	Road, Huntington, Ind.	8-17
9- 4	Road, Salem, Ind.	8-24
9- 4	Gravel road, Columbus, Ind.	8-24
9- 4	Road, Greensburg, Ind.	8-24
9- 4	Road, Vernon, Ind.	8-24
9- 5	Road, Winamac, Ind.	8-24
9- 5	Road, English, Ind.	8-24
9- 5	Road, Rockville, Ind.	8-24
9- 5	Road, Covington, Ind.	8-24
9- 5	Road improvement, Aberdeen, Miss.	8-24
9- 5	Repaving, Jacksonville, Fla.	8-24
9- 5	Roads, Bloomfield, Ind.	8-17
9- 5	Road, Crawfordville, Ind.	8-17
9- 5	Roads, Logansport, Ind.	8-17
9- 5	Roads, Vincennes, Ind.	8-17
9- 5	Roads, Monticello, Ind.	8-17
9- 5*	Street improvement, Westfield, N. J.	8-17
9- 5	Paving, etc., Cleveland Heights, Ohio	8-10
9- 6	Road Monticello, Ind.	8-24
9- 6	Road Lafayette, Ind.	8-24
9- 6	Bridge, Barberton, Ohio	8-24
9- 7	Road, Newport, Ind.	8-24
9- 7	Road, Laporte, Ind.	8-24
9- 7	Gravel road, Camden, N. J.	8-24
9- 7*	Lock and dam, Louisville, Ky.	8-10
9- 6	Paving, Lewiston, Idaho	8-17
9- 7	Roads, Wabash, Ind.	8-17
9- 7*	Paving, Johnson City, Tenn.	8-17
9- 8	Road, Crownpoint, Ind.	8-24
9- 8*	Street improvement, Huntington, N. Y.	8-24
9-11	Grading, New Philadelphia, Ohio	8-17
9-12	Paving, Little Rock, Ark.	8-24
9-15	Macadamizing, etc., Columbus, Ohio	8-24
9-15	Road, Greenfield, Ind.	8-17

Miscellaneous.

Bids close.		Noted in issue of
8-24	Concrete wall, Boston, Mass.	8-17
8-25	Freight elevators, Philadelphia, Pa.	8-24
8-25	Fountain, etc., Santa Monico, Cal.	8-10
8-25	Floating crane, Brazil (Foreign)	7-27
8-26	Dredging, etc., New York, N. Y.	8- 3
8-26	Tower, etc., Ottawa, Ont.	8-10
8-26	Ditches, Spooner, Wis.	8-24
8-28	Levee work, etc., Carlinville, Ill.	8-24
8-28	Wharf, New Orleans, La.	8-24
8-28	Filling, Minneapolis, Minn.	8-24
8-28*	Tug, Duluth, Minn.	8- 3
8-28*	Breakwater, Detroit, Mich.	7-27
8-28	Steel plate girders, Panama (U. S. Poss.)	8-10
8-28	Comfort stations, etc., Columbus, Ohio	8-17
8-28	Tunnel street, New York	8-17
8-28	Wharf, Norway Bay, Que.	8-17
8-28	Wharf, Fort William, Que.	8-17
8-29	Melting cupola, Vallejo, Cal.	8- 3
8-29	Ditches, Brownsville, Tex.	8- 3
8-29*	Harbor work, Michigan City, Ind.	8- 3
8-30	Dikes, Philadelphia, Pa.	8-10
8-29	Brass, steel, etc., Washington, D. C.	8-24
8-30	Ditch work, Pocahontas, Ia.	8-24
8-31	Road oil, New York	8-24
8-31	Repairs to shelter house, New York	8-24
8-31	Spikes, etc., Toronto, Ont.	8-24
8-31	Dredging, Philadelphia, Pa.	8-10
8-31	Drilling machines, Argentina (Foreign)	7-20
8-31	Ditch, Mankato, Minn.	8-17
9- 1	Submarine boats, Wash, D. C.	6-29
		6-29
9- 1*	Dredging and filling, Minneapolis, Minn	7-27
9- 1*	Lockers, Chicago, Ill.	8-10
9- 1	Soil work, etc., Boston, Mass.	8-10
9- 1	Fence, posts, Portland, Ore.	8-17
9- 1	Ditches, La Marque, Tex.	8-17
9- 1	Steel bars, lumber, Panama (U. S. Poss.)	8-24
9- 1	Plans for memorial gate, Madison, Wis.	8-24
9- 2	Concrete tunnel, Maumee, M.	8-10
9- 4	Levee work, New Orleans, La.	8-17
9- 5*	Dam, Fort Worth, Tex.	7-20
9- 5	Telephone material, Australia (Foreign.	7-27
9- 5*	Dredging, Richmond, Va.	8- 3
9- 5	Dredges, snagboat, Charleston, S. C.	8- 3
9- 5	Tugboats, Brazil (Foreign)	8-10
9- 5*	Softening plant, Muskogee, Okla.	8-10
9- 5	Fire alarm system, New York	8-24
9- 6	Dredge, Portland, Ore.	8- 3
9- 6	Additions to steamer house, Albany, N. Y.	8-17
9- 7	Monument, Princeton, Ind.	8-10
9- 7	Snow and ice removal (Garbage), New York	8-24
9- 7	Cement, Council Bluffs, Ia.	8-24
9- 8*	Breakwater construction, Hawaii, (U. S. Poss.)	7-13
9- 9	Tramway, Spain (Foreign).	7-27
9- 9*	Dredging, Wilmington, Del.	8-17
9-11*	Breakwater extension, Buffalo, N. Y.	8-17
9-11*	Dredging, Wilmington, Del.	8-17
9-11	Breakwater, Thessalon, Ont.	8-17
9-11*	Wagon shed, Fort Terry, N. Y.	8-24
9-12*	New channel, Clarinda, Ia.	8-24
9-13	Projectiles, Washington, D. C.	8-24
9-13	Breakwater, dredging, Port Stanley, Ont.	8-24
9-13	Pier, Wheatley, Ont.	8-24
9-13	Wharf, etc., Thornbury, Ont	8-24
9-13	Dredging, Wilmington, Del.	8-24
9-14*	Dredging, New York	8-17
9-14	Lock tenders' houses, Mobile, Ala.	8-24
9-15	Railway roadbed, El Paso, Tex. (Rys.)	8-24
9-15	Dredging, Wilmington, Del.	8-24
9-15*	Removing rock, Newport, R. I.	8-24
9-15	Elevator plant, Washington, D. C.	8-17
9-15	Railway construction (Rys.), Ottawa, Ont.	8-17
9-15*	Mail handling apparatus, Washington, D. C.	8-10
9-15	Mechanical equip., Washington, D. C.	8-10
9-17*	Dredging, New York	8-17
9-21	Fuel Engineering Chemist, New York,	8-24
9-21*	Dredging, Bridgeport, Conn.	8-24
9-22*	Dredging, Norfolk, Va.	8-24
9-25	Fire apparatus, Winnipeg, Man.	8-24

Examinations.

Examination date.		Noted in issue of
9- 6	Geologist, Washington, D. C.	8-10
9- 6	Agricultural Inspector, Washington, D. C.	8-10
9- 6	Laboratory Aid and Engineer, Washington, D. C.	8-10

TRADE PUBLICATIONS.

(The standard sizes for pamphlets and trade catalogs recommended by all the principal engineering societies of the United States are: 3½ x 6 ins., 6 x 9 ins. and 9 x 12 ins.)

ASPHALT PRODUCTS.—Standard Asphalt & Rubber Co., 137 South La Salle St., Chicago, Ill. Paper; 3½ x 6 ins.; pp. 16; illustrated.

This company manufactures the "Sares" asphalt products, using as a base gilsonite, a form of natural asphalt. A large plant has been established at Independence, Kan., where products for pavements, water-proofing material, flooring, mineral paint, electric insulation, etc., are manufactured.

HOLLOW CONCRETE DAMS.—Ambursen Hydraulic Construction Co., 88 Pearl St., Boston, Mass. Stiff paper; 8 x 11 ins.; pp. 52; illustrated.

This booklet tells in an interesting way the history of the Ambursen hollow concrete dam. Starting with the year 1903, when the first hollow concrete dam was built at Theresa, N. Y. by Messrs. Ambursen & Sayles, of Watertown, N. Y., the story of the more important projects is carried through year by year to the beginning of 1911. Then follows a series of views of the Boston headquarters of the company and short biographies of the professional careers of its executive officers.

WIRE ROPE.—The Trenton Iron Co., Trenton, N. J. Stiff paper; 6 x 8 ins.; pp. 80; illustrated.

Besides being a catalog of wire rope and accessories, this booklet also comprises some 30 pages of text on the various uses of wire rope and the computations for strength when used for these purposes. This catalog was prepared by Mr. William Hewett, M. Am. Soc. M. E., and contains much useful data and several handy tables. The data includes formulas for the use of wire rope for power transmission, formulas and theory for computing the strength of wire cables and their deflections, directions for splicing wire rope, etc.

AUTOMATIC SIGNAL APPLIANCES.—The Hall Signal Co., New York and Chicago. Cloth; 6½ x 9½ ins.; pp. 140; illustrated.

This catalog is composed of separate pages fitted in a loose binding with provision for inserting additional pages as they are issued. There is very little descriptive matter, the pages consisting largely of lists of detail parts of different signal apparatus, with their order numbers and list prices. The apparatus listed in the present pages includes switch and tower indicators, charging switches, relays, electro-mechanical slots, electric motor signals, lightning arresters, etc. The apparatus is illustrated in great detail, and there are views of signal installations.

CONCRETE MIXERS.—The Standard Scale & Supply Co., Pittsburg, Pa. Stiff paper; 6 x 9 ins.; pp. 32; illustrated.

The "Eclipse" mixer described in this catalog is made of a cylindrical drum of rolled plate steel supported on trunnion rollers. It is rotated by gears meshing into gear bands on the outside of the drum. The mixing is done by blades, some of which are placed in the center of the drum so that they throw the material to the sides where it is acted upon by blades placed at an angle in the sides, producing a longitudinal, or end to end, mixing in addition to the pouring action caused by the rotation of the churn. Drums are made in sizes 36 x 30 ins. to 60 x 75 ins.

EARTH-HANDLING MACHINERY.—Western Wheeled Scraper Co., Aurora, Ill. Paper; 10 x 6¼ ins.; pp. 128; illustrated.

The wheeled scraper was invented by a contractor in 1877. They were first used only by this contractor, but the demand for them became so great that their manufacture was soon begun on a commercial scale. Since then they have been a common tool with all grading contractors. Wheeled scrapers have long been one of the most famed products of this firm and are fully described in this catalog. Besides scrapers, plows, contractors dump cars, spreader cars, elevating graders, dump wagons, road scrapers and portable stone-crushing plants are also illustrated. The dump cars are now made of all steel construction and equipped with compressed-air dumping device they represent a thoroughly up-to-date contractor's equipment.

SLUICE GATES.—Coldwell-Wilcox Co., Newburgh, N. Y. Paper; 11 x 8 ins.; sheets 34; illustrated.

One page of this catalog is devoted to general specifications for sluice gates and hoisting standards. Twelve pages illustrate rectangular and circular sluice gates, giving tables of sizes for standard stock. Several pages are devoted to operating machinery for the valve gates. Waterworks screens, manhole covers and flexible pipe joints are also described.

ELECTRIC GENERATORS. — General Electric Co., Schenectady, N. Y. Bulletins 4832 and 4847. 10½ x 8 ins.; illustrated.

The first bulletin describes a line of small belt-driven generators for small isolated-plant service. These are a commutating-pole type ranging in capacity from two to 150-KW., and in voltage from 125 to 575.

The second bulletin describes a somewhat similar line of alternating-current generators of from 50 to 200-KW. capacity, with two or three-phase windings. The exciter is attached to the outer bearing frame.

DIESEL OIL ENGINES.—Busch-Sulzer Bros.-Diesel Engine Co., South Side Bank Bldg., St. Louis, Mo. Paper; 8 x 10½ ins.; pp. 10; illustrated.

This company is the successor to the American Diesel Engine Co., and this pamphlet describes types A 3 and A 6 stationary Diesel engine, which are guaranteed not to exceed a fuel consumption of 8 gals. of fuel oil per 100 B. HP.-hrs. at any load between rated capacity and half load. The drawings of the engine shown indicate that the construction conforms closely to standard European practice in Diesel engine construction. The curve of economy indicates that the engine holds up its efficiency well until the load falls off to 25% rated capacity.

ELECTRIC LAMPS.—General Electric Co., Schenectady, N. Y. Bulletins 4850 and 4863. 10½ x 8 ins.; illustrated.

The first bulletin describes the new type of tungsten-filament lamps made from drawn instead of squirted wire. These lamps as made by this company and its licensees bear the trade name "Mazda." A large number of installations of these lamps are pictured.

The second bulletin describes the so-called "Gem" lamp, which is a development of the older carbon filament type. By gradual development it has been possible to improve the first "Gem" construction so that the filaments have many of the advantages of the old carbon lamps with the improvement in color of light and economy.

LINOFELT.—Union Fibre Co., Winona, Minn. Paper; 5 x 9 ins.; pp. 64; illustrated.

Linofelt is the trade name of a fiberous material which comes in rolls for use in sheathing houses, and for placing between floors and partitions as a sound deadening material. Another style is made in trough-shaped strips to be fitted between the studding of houses for protection against cold. The product is a flax fiber, steam cooled and chemically treated, placed between sheets of building paper. Another product of this firm shown in this catalog is lith board, a material made of 80% mineral wool and 20% flax fiber to be used in brick and concrete buildings as protection from cold and as a sound deadener. This material is made in boards 18 x 48 ins. and can be handled like lumber.

REINFORCED-CONCRETE DESIGN.—The "Xpantrus" System.—The Consolidated Expanded Metal Co., Pittsburg, Pa. Cloth; 8 x 5½ ins.; pp. 104; illustrated.

This is a copyrighted loose-leaf note book gotten up to aid designers who use this system of concrete reinforcement. Included are specifications for steel, the straight-line theory of reinforced-concrete beam design with diagrams, and a clearly illustrated description of the "Xpantrus" system of reinforcement, and the application of the foregoing theory to it. There are about 50 pages of tables, including safe loads on concrete Tee beams, cubic feet of concrete per lineal foot of rectangular beams and columns, weight of concrete per lineal foot, materials for one cubic yard of concrete, safe loads on wooden columns and wooden beams and a table of board measure. A fairly complete index is added.

AUTOMATIC SCALES.—Avery Scale Co., North Milwaukee, Wis. Paper; 8¾ x 11 ins.; pp. 16; illustrated.

The principal product described in this catalog is an apparatus for automatically weighing coal and water for boilers. The coal weigher is designed on the principle of the equal-armed beam. It is set for discharge at a certain weight and when once started it is automatic, discharging as fast as that weight accumulates. The smallest size hopper has a capacity of 100 lbs. of coal. The water weigher is designed on the same principle and weighs a constant stream of water by means of a tipping bucket. Each emptying of the hopper and bucket is automatically recorded. A number of typical installations are shown and a diagram of its efficiency. Besides this apparatus other automatic weighing scales with totaling devices for registering successive loadings are illustrated and described.

BLUE PRINTING MACHINES.—Revolute Machine Co., 417 East 93d St., New York City. Paper; 4 x 6¼ ins.; pp. 12; illustrated.

"The Blue Streak" is the name given by the makers to this machine, and it is claimed by them to be the fastest blue-printing machine yet made. The paper and tracings are fed past a row of electric arc lamps by a revolving glass cylinder, like that of the Everett-McAdam blue-printing machine. The lights are enclosed in a reflector hood and shine on the paper through the revolving glass cylinder. This machine is made in one size only, for paper 57 ins. wide, and with 6 lamps operating at 10 amperes each on a 220-volt direct current, it is claimed to print at a speed of 20 lineal ft. per min. The machine may be used for brown or other process prints. The heat of the lamps is driven away by a small power blower which forces air between the revolving cylinder and the arc lamp globes, and through a pipe into one end of the cylinder. The machine is operated by ¼-HP. motor at 220 volts. The shipping weight of the outfit is 1,300 lbs. and the cost $975.

TANKS.—W. E. Caldwell Co., Louisville, Ky. Cardboard; 8 x 10 ins.; pp. 92; illustrated.

This firm originally made tanks only of wood, but later took up the manufacture of steel tanks and towers, and within the past year have added a structural steel plant designed for heavy tank work, especially those with hemispherical bottoms. This catalog illustrates a number of large tank installations in various parts of the country for municipal water-works and for private corporations. On page 18 is a table giving the prices of 4 and 12-column tubular steel towers which will be of service to all engineers engaged in estimating along these lines. On page 33 is a similar table for latticed steel columns, and following a table for angle columns. There are four pages of prices of wooden stave tanks, giving the capacity, diameter, etc., of tanks from 74 gals. to 123,370 gals. capacity. Two pages, fully illustrated, show the method of setting up a wooden stave tank. Two pages give the cost of tank roofs of various designs. The last 8 pages describe various tank accessories also manufactured by this firm.

For other Proposal Advertisements see pages

49, 50, 52, 53, 54, 56, 58, 60

of Advertisements and Construction News, page 98

PAVING.

Stamford, Conn.

Sealed proposals will be received by the City Clerk of the City of Stamford, at his office in the Town Hall of said city until 8 p. m., Tuesday, Sept. 5, 1911.

Said proposals to cover the furnishing of materials and the performance of labor required for the paving of a portion of Elm Street, in accordance with plans and specifications for said work.

Plans may be seen and copies of the specifications may be had by calling on said City Clerk at said office on or after Monday, Aug. 28, 1911, and depositing Ten ($10.00) Dollars, for which his receipt may be had and which sum of money will be returned upon the return of the specifications in good order to said City Clerk.

The proposed work consists approximately of about 5,500 square yards of brick pavement with the necessary grading and foundation.

Each bid must be made on a blank form attached to the specifications, and must be accompanied by a certified check for $1,000, as a guarantee that the bidder, if his bid be accepted, will enter into contract and execute the required bond.

Bids must be enclosed in sealed envelopes, marked "Proposal for the paving of Elm Street," and each must be enclosed in a second sealed envelope addressed to,

THE BOARD OF COMMON COUNCIL,
City of Stamford, Fairfield County, Conn.

PAVING, ETC.

Cortland, N. Y.

Will let contract to construct two miles of fence for State Road, also 1,700 yds. of cobbled paving. Will furnish all material. For particulars, address THOMAS O'HERN, R. F. D., No. 1, Cortland, N. Y.

TREASURY DEPARTMENT, Office of the Supervising Architect, Washington, D. C., August 18, 1911. The time for opening all bids for the completion of the fourth floor in the United States Post Office and Court House at Grand Rapids, Michigan, is hereby extended from August 31st to the 14th day of September, 1911. JAMES KNOX TAYLOR, Supervising Architect.

OFFICE CONSTRUCTING QUARTERMASTER, Fort Huachuca, Ariz., August 22, 1911.—Sealed proposals in triplicate for construction complete, plumbing and heating, 1 four set officers' quarters and 3 double officers' quarters and complete construction and plumbing administration building, two-company barrack, band barrack and storehouse, will be received until 11 a. m., Sept. 16, 1911, and then opened. Plans and specifications furnished on application. Intending bidders can also examine plans and specifications at offices Chief Quartermasters, Chicago and San Francisco; Purchasing Quartermaster, Denver; Constructing Quartermasters, Fort Leavenworth, Kansas and Fort Sam Houston, Texas. Deposit of ten dollars will be required to insure return of plans and specifications.

POSTPONEMENT.—Proposals for Metal Wall Lockers. Chief Quartermaster's Office, Federal Building, Chicago, Ill., August 22, 1911. The date of opening of proposals for Metal Wall Lockers advertised for by this office under date of August 1, 1911, is postponed from September 1, 1911, to September 25, 1911, at 11 o'clock a. m. COL. JNO. L. CLEM, Chief Quartermaster.

Situations Open
(Or Vacant)

WANTED.—Architectural Draftsmen with experience in the design and construction of various classes of buildings. State education and experience in detail and salary expected. Location Massachusetts. Address, "M. B. 8," Engineering News, New York. 8-1t

DRAFTSMAN wanted by Philadelphia concern. Must be experienced in detailing all kinds of ornamental iron work. State age, experience and salary desired. Address, "O. B. 8," Engineering News, New York 8-1t

WANTED.—Sales Agents on best steam traps and separators on the market. Metropolitan and provincial territories on commission basis. Address FISHER, 90 West St., New York. 8-5t

STRUCTURAL Steel Draftsmen. Checkers and Detailers familiar with Apartment and Loft building work. New York City. Address, "S. B. 8," Engineering News, New York. 8-2t

Miscellaneous Wants

Rock Excavation to Sub-Let

A Contractor in Northern New York has about 50,000 yards of rock excavation to sublet. Suitable for heavy steam shovel and dinkies. Address, "P. B. 8," Engineering News, New York. 8-2t

Reinhardt's
TECHNIC OF MECHANICAL DRAFTING
Shows how to do it right Price, $1.00

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PROPOSALS .....

RA

*(*Denotes that th Engine*

Maine.—Bango The State Rail received an app to reconstruct a along the Ashla Houlton, Me., is

New York.—U R.—A reorganiz has been made same name and nal plan of b Schenectady, wi be made with th company owns section from M tady and fro Branch.

†Pennsylvani Erie R. R.—A has been let CONSTRUCTIO Pa., for a line link between t railroad and traffic originat & Northern R.

†Kentucky.— R. R.—A 7-mi ter's Fork to Fork, by way be built, the been been let Richmond, Va.

Ohio.—New Shore & Michi cording to pre improvements, ture of bout which include perior St., the Creek and Mi the downtown of all its grad of a Union c the removal o and the center at Air Line Ju

Wisconsin.— R.—The Wis has granted eastern R. R. venience and extension of it to Eau Claire Menomonie, W

†Wisconsin. ern Ry.—A c proposed Oma tracking, in t has been awa Iron Mounta price is $500,0

Kansas.—A Fe Ry.—Pres company cont Dodge City in of Kansas th transportation also, has un erable double

North Dak Ry.—A surve a line betwe Antler, N. Da that the line Frobisher to the Sherwoo but accordin line will go

†Arizona.— R. R.—Addi concrete wo MacArthur Sections 16 t ed to the CO CO., Tuscon; to SMITH & tions 14 to 1 IAMS, Yuma ed to L. G. to 33 award Denver.

California Ry.—Under newly form tion of a li Santa Mon Darlington,

Saskatche & St. Paul the North katchewan J. Earling,